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ABSTRACT

Sixty-one measurement instruments, all of which have at least minimal reliability and validity are described. They were carefully selected and cross-referenced according to their correlation with the most common needs, goals, and content areas of multi-year projects funded in 1976 by the Women's Educational Equity Act Program (WEEAP). These tests include: (1) instruments appropriate for evaluating results of the three major types of projects funded under WEEAP--projects to develop and validate programs, curricula, and materials, to effect institutional change and reform, and to conduct staff development; (2) instruments appropriate for evaluating results in content areas common to projects funded by WEEAP, including career development, occupational/leadership/training, self concept, sex stereotyping behaviors, sex stereotyping awareness, sex stereotyping attitudes, and techniques for coping and combatting sex stereotyping; (3) instruments representative of the following types of measurement: questionnaires and interviews, rating scales, observation, unobstrusive measures, attitude scales, social indicators, and content analysis; and (4) instruments containing appropriate development and/or background information. Guidelines for selecting and using the tests are included. (Author/HV)

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OFFICE OF EDUCATION

MEASURES OF EDUCATIONAL EQUITY FOR WOMEN

A RESEARCH MONOGRAPH

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PREFACE

The Women's Educational Equity Act (WEEA) was passed as part of the Special Projects Act of the Education Amendments of 1974, Public Law 93-380. Authorized under this act is "an extremely broad range of activities that target on every area of education that perpetuates sex bias and thereby opens many avenues to carry out the purpose of providing educational equity for women."[1]

During Fiscal Year 1976, over $4 1/2 million was awarded to 67 grantees to carry out the goals of the program. The Women's Program Staff of the U.S. Office of Education perceived the need to give technical support to the 67 project directors who were recipients of grants and awarded contracts for five different types of assistence to grantees. One of these, Measurement Instrument Development, was conducted by the Career Development Research Group of the American Institutes for Research (AIR).

The main purpose of the project was to locate and make available and usable suitable measurement instruments to facilitate evaluation in present and future projects for women's educational equity. The major product from this contract was a 3-volume, 952-page Measurement Instrument Package[2] and accompanying Project Director's Guide.[3] The Measurement Instrument Package contains both descriptions of 61 assessment instruments judged to be potentially useful to researchers in women's equity and a copy of the actual assessment instrument. This monograph contains just the descriptions and was produced in greater quantity in order to facilitate the dissemination of information. Availability of the complete Measurement Instrument Package is, as of this writing, under control of the Women's Program Staff. Persons wishing access to the complete set of volumes are encouraged to contact the Women's Program Staff directly.

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[1] U.S. Department of Health, Education, and Welfare. Women's Educational Equity Act, First Annual Report, September 30, 1976.

[2] Williams, K., Parks, B.J., Finley, C.J., & Austin, M. Measurement Instrument Package: An Evaluation Resource. Palo Alto: American Institutes for Research, 1977.

[3] Parks, B.J., Williams, K., & Finley, C.J. Measurement Instrument Package: Project Director's Guide. Palo Alto: American Institutes for Research, 1977.

Evaluation is usually a required component of federally funded projects. The rationale for this requirement is based on the assumption that an effective evaluation system makes the achievement of project goals more likely. The instruments selected and the descriptions written were developed to help strengthen the evaluation effectiveness of projects funded by WEEA.

It is hoped that this monograph will not only serve as a valuable resource to project directors, but that it will also increase the tendency toward cumulative, systematic research in women's educational equity. If the instruments are used appropriately by different projects and results reported consistently, outcomes by different investigators can be compared and assessed. Such activity would contribute to both a research data bank and to the improvement, availability and usefulness of the instruments themselves.

Although the instruments in this monograph represent a sizable body of content, the work is by no means exhaustive. No doubt, many good instruments exist that have not been included. Project directors and/or evaluators should be prepared to seek instruments from other sources in addition to this monograph to meet their specific evaluation needs.

The information presented in this monograph is intended to help the WEEAP project director and/or educator successfully select and use appropriate measurement instruments.

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Project Director

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ACKNOWLEDGMENTS

The Measurement Instrument Development Project was a comprehensive search and development effort that required the cooperation of many people: project staff, test authors and publishers, testing and evaluation consultants, and an external advisory committee. It is impossible here to name all contributors. A special appreciation and recognition is extended to all authors and publishers who permitted inclusion of their measurement instruments in the package. All authors and publishers are cited in the instrument descriptions in this monograph.

The members of the External Advisory Panel and the Content Validation Panel, listed below, were most helpful in their advice, suggestions, and criticisms.

Ms. Marie Battiste, University of California

Dr. Reuben A. Burton, California State Department of Education

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INTRODUCTION

Accurate, usable information is an important commodity for project directors. To be knowledgeable about the processes and products that appear to produce the best results for their particular target populations, project directors need access to information about (1) the changes that have taken place during a specific time period and (2) the internal and external factors that may be affecting these changes, positively or negatively. This monograph is designed as a tool to help project directors in their search for and use of suitable measurement instruments to answer questions about the changes and results brought about by their projects.

The monograph describes 61 measurement instruments, all of which have at least minimal reliability and validity. They were carefully selected and cross-referenced according to their correlation with the most common needs, goals, and content areas of multi-year projects funded in 1976 by the Women's Educational Equity Act Program (WEEAP).

Ideally, the monograph should describe any instrument that might contribute to the data bank in educational equity and to increasing the understanding of women's educational equity. Time, however, did not permit such an exhaustive work. A condensation of the criteria used to select instruments for the package (and this monograph) follows:

- Instruments appropriate for evaluating results of the three major types of projects funded under WEEAP, including projects (1) to develop and validate programs, curricula, and materials, (2) to effect institutional change and reform, and (3) to conduct staff development.
- Instruments appropriate for evaluating results in content areas common to multi-year projects funded by WEEAP, including (1) Career Development, (2) Occupational/Leadership/Training, (3) Self Concept, (4) Sex Stereotyping Behaviors, (5) Sex Stereotyping Awareness, (6) Sex Stereotyping Attitudes, and (7) Techniques for Coping and Combatting Sex Stereotyping.

- Instruments representative of the following types of measurement: (1) questionnaires and interviews, (2) ratings, (3) observations, (4) unobtrusive measures, (5) attitude scales, (6) social indicators, and (7) content analysis.
- Instruments containing appropriate development and/or background information.
- Instruments available for inclusion in the package.

The monograph is organized in four sections. The first section describes the development and validation procedures used by AIR in the design and preparation of the instrument package that was the basis for this monograph. The second section provides suggestions and examples of how individual projects might use the monograph.

The third section is an index that cross-references all the instruments described in this monograph by project type, content area, and target population. The last section contains the descriptions, organized alphabetically by title of the measure.

DEVELOPMENT AND VALIDATION

The main steps taken in developing and validating the instrument package included the following: (1) a comprehensive search for instruments; (2) a thorough investigation of each instrument's history, development, and validation; (3) a modified field test approach to the development of instrument descriptions; (4) a validity classification of instruments; (5) a content validation study of selected instruments, and (6) expert review of reliability and validity data. Each of these steps is described briefly in the remainder of this section.

Search for Instruments

The search for instruments located both published and unpublished measures. In searching for published instruments, project staff contacted 63 publishers, reviewed 42 catalogs, and examined a number of reference works, including Buros' Tests in Print and publications from the Institute for Social Research, Survey Research Center at the University of Michigan, as well as about 20 major references on evaluation. (See References, page 35).

To locate unpublished measures, project staff conducted a computer search using the DIALOG/ERIC system, contacted the ERIC Clearinghouse on Tests, Measurement, and Education, and visited the Educational Testing Service Test Collection and the Stanford Center for Research on Women. Letters of inquiry were sent to approximately 90 researchers and organizations conducting research on women or sex roles; to 150 women's studies centers at colleges and universities; and to the 51 Title IX Coordinators in states and territories. WEEAP project directors were contacted and asked to contribute to the instrument collection whenever they found a potentially useful instrument.

The search lasted from September 1, 1976, to January 1, 1977, and located 231 instruments that were potentially useful to WEEAP projects.

Investigation of Instruments

Project staff collected as much historical and developmental information as possible for each instrument. Investigation of instruments was focused on answering questions on aspects of greatest interest to potential users.

These questions included the following:

- What is the instrument's title, date of development, and date of revision (if any)?
- Who is the author and where is the author located?
- Is the instrument published and, if so, who and where is the publisher?
- What is the stated purpose of the instrument?
- For what target audience was the test developed?
- What are the suggested uses of the instrument?
- How can the instrument best be summarized for the potential user?
- What is the theoretical base of the test?
- On what population was the test validated?
- How many items does the test have and approximately what amount of time is required for administration?
- Are there any subscales of the instrument?
- What type of response does the instrument require?
- How is the test to be administered?
- How are test results to be interpreted?
- What type of scoring is required?
- What is the cost?
- Is the instrument copyrighted and what arrangements must be made for its use?
- Is the instrument considered reliable?
- How was reliability established?
- Is the instrument considered valid?
- How was validity established?

Staff eliminated many instruments from the package as a result of this inquiry.

The investigation process for each instrument varied in the amount of time and resources needed. Most of the unpublished instruments required a series of lengthy inquiries and contacts. On the other hand, the published instruments generally had manuals that contained all needed information. In the case of the latter, the main task became one of sorting out and summarizing the necessary information.

Development of Instrument Descriptions

After collecting information on each instrument, staff developed a formal description for each instrument. Several different formats were drafted in an effort to establish the most useful design. Comments and recommendations from testing experts and the external advisory committee were solicited on each format. Each draft description was sent to the test author for comments, criticisms, and suggestions. The final instrument description format was based on the results of these review procedures. The final format describes each instrument in relation to the following categories: Author, Purpose and Use, Description (including development, format, administration, scoring, cost, and availability), Reliability, Validity, Other Technical Information Given, Results and Comments, Source, and References.

Validity Classification of Instruments

In addition to classifying instruments according to their compatibility with different types of projects, different content areas, and different target populations, staff classified them according to a validity rating, as follows:

- valid, reliable, available
- available, needs data on validity and reliability
- validity and reliability data uncertain, investigation in progress
- needs development, modifications

A sizable number of instruments were rated as needing more validation data. These instruments were primarily checklists, rating scales, and questionnaires concerning achievement of objectives. Due to time restrictions, it was not possible to conduct elaborate validation studies. However, each instrument judged to be in need of some validity information

was subjected to content validation procedures. The procedures are summarized below.

Content Validation Procedures

Content validation was considered to be the single most important method for improving the usefulness of instruments lacking validity and reliability information. The basic validity question addressed by reviewers was: "Does the instrument serve its purposes with respect to the group for which it is intended?"

A total of 24 instruments were classified as needing content validation. The instruments were grouped according to similar subject matter and distributed among members of two review panels.

AIR's External Advisory Committee served as the "off-site" panel of experts for content validation. Each committee member was asked to review eight instruments and rate them according to the following criteria:

- Does the instrument measure what it says it measures?
- Is the instrument appropriate for intended target populations?
- Do the items in the instrument represent important knowledge/skills/tasks in the particular content area?
- Are directions for administration clear?
- Are methods of scoring clear?
- Considering any limitations noted above, would you recommend this instrument for inclusion in the instrument package?

For item examination, the panel reviewed each instrument to determine problems related to any individual item, particularly in respect to (1) difficulty, (2) clarity, and (3) importance.

Additionally, an "on-site" content validation conference was held to examine the 24 instruments. The panel for this session consisted of one member of AIR's External Advisory Committee and two outside reviewers. The panel was asked first to review the 24 instruments before the on-site meeting. Each panel member was assigned primary responsibility for a designated number of instruments. This responsibility included a detailed examination of the designated instruments according to the same criteria used by the "off-site" reviewers and a presentation about and discussion of each designated instrument. AIR staff served as recorders and facilitators for the on-site meeting.

Results of Content Validation

Due to unanimous or majority consensus of reviewers, eight instruments were omitted from the package because of insufficient reliability and validity information, as well as questionable use and confusing formats. Scoring and administration directions were suggested and developed for instruments lacking such information. A revised format was suggested for two of the instruments. (That format was included as an attachment to the instrument description in the package.) In summary, the content validation procedures gave research staff more confidence in including in the package those instruments that appeared to be potentially useful but did not contain adequate information on development.

Expert Review of Reliability and Validity Data

Many instruments selected for the package were reviewed to determine the quality and appropriateness of validity and reliability procedures used in their development. The review was conducted by qualified evaluation and measurement personnel. This review provided additional technical information that resulted in the elimination of one instrument and revisions in the descriptions of several other instruments.

USING THIS MONOGRAPH

The primary audiences for this monograph are WEEA project directors and evaluators. This section of the monograph presents guidelines that should enable project directors and evaluators to make best use of the monograph as it applies to their current project needs. It includes a checklist for the steps useful in selecting instruments and two illustrations of plans for instrument use.

Use of the descriptions will be maximized by observing the following six steps: (1) identify your project type and main content areas; (2) identify project goals and objectives; (3) decide what the immediate and longer range results of the project ought to be; (4) review descriptions in categories corresponding to those you have identified in steps (1), (2), and (3); (5) select instruments that appear best to meet your needs; and (6) recognize limitations of the monograph. Each of these activities are explained further in the following paragraphs.

1. Identify Project Type and Content Areas

The first step is to classify your project by one of three primary types. Is your project the type designed to: (1) develop and validate programs and instructional materials, (2) effect institutional change and reform, or (3) conduct staff development? These are the three main types of projects according to which all of the instruments are indexed.

Additionally, for step one, identify the major content areas of the project to match more closely projects and appropriate instruments. The content areas covered in the monograph include instruments helpful for measuring (1) career development, (2) occupation/leadership/training, (3) self concept, (4) sex stereotyping behaviors, (5) sex stereotyping awareness, (6) sex stereotyping attitudes, and (7) techniques for coping and combatting sex stereotyping. More specifically, all instruments in the monograph are classified under one or more of the following categories (types and content areas):

I. Developing Programs and Instructional Materials
   A. Career Development
   B. Occupation/Leadership/Training
   C. Self Concept
   D. Sex Stereotyping Behaviors
   E. Sex Stereotyping Awareness
   F. Sex Stereotyping Attitudes

II. Effect Institutional Change and Reform
   G. Sex Stereotyping Behaviors
   H. Sex Stereotyping Awareness
   I. Sex Stereotyping Attitudes

III. Conduct Staff Development
   J. Occupation/Leadership/Training
   K. Sex Stereotyping Behaviors
   L. Sex Stereotyping Awareness
   M. Techniques for Coping and Combatting Sex Stereotyping
   N. Sex Stereotyping Attitudes

2. Identify Project Goals and Objectives

The second step is to identify clearly your project goals and objectives. Goals and objectives of WEEA projects are likely to have many similarities. However, each project will have a different context, a unique physical and psychological setting. One of the main purposes of the monograph is to help project directors measure to what extent their projects have achieved their goals and objectives. To do this, project directors must have information on the status of knowledge, skills, attitudes, and practices related to their particular settings and target populations. Many of the instruments described in the monograph may be used to compare the original conditions to results of project experiences if project goals and objectives are clearly understood and identified.

3. Decide upon the Desired Results of the Project

Deciding what the immediate and long-range results of your project ought to be will help further in identifying appropriate instruments for use. For example, one of the overall goals of a project may be to reduce career role stereotyping among high school women. One indicator of achieveing this goal might be the selection of and identification with a greater variety of non-traditional occupations by these women. The type of instrument helpful in measuring this outcome will be one that allows the women to choose occupations before and after their project experiences. Such an instrument most likely will be found under "I.A." or "I.B."--Developing Programs and Instructional Materials; Career Development or Occupation/Leadership/Training. (Refer to page 21 for a complete cross-reference index of instruments.)

4. Review Descriptions

In this monograph, descriptions are organized alphabetically by instrument title. To locate specific instruments, the cross-reference index should be used as described in the preceding example. If all the preceding activities have been completed (identification of project type, content, goals, objectives, and results), the next step is to turn to the cross-reference index, find the appropriate categories, and write down the names of the instruments under each category. The Table of Contents lists the descriptions and page numbers for each instrument. Each description presents information about the following aspects of an instrument:

- Author
- Purpose and Use
- Development
- Format
- Administration
- Scoring
- Cost
- Availability
- Reliability
- Validity
- Source
- References

If further information is needed, project directors should contact authors and/or publishers. (Copyright information is given in the part of the instrument description under "Availability.")

In summary, the five primary steps to follow for effective use of the monograph include:

1. Identify your project's type and content area, then match them with types and content areas of instruments in the appropriate cross-reference index or on the Instrument Selection Checklist provided at the end of this section.
2. Identify your project's goals and objectives and match them with the checks you made in step 1 above.
3. Identify the expected results of your project and match them with project types and content areas of instruments in the cross-reference index.
4. After completing a list of potential instruments, read the instrument description.
5. Select the instrument that best meets your needs and obtain a sample copy for further review of the instrument.

Figure 1, on pages 13-14, provides a checklist of steps and activities helpful for selecting appropriate instruments from the monograph. Use of the checklist may prove particularly helpful during the user's first attempt to select specific measurement instruments.

Figure 1

CHECKLIST FOR SELECTING INSTRUMENTS

This checklist is provided for the user's convenience in first attempting to select instruments from the monograph. The form requires checking a set of characteristics that most closely match those characteristics of the user's project. In cases where none of the given characteristics are similar to the project in question, the users must provide their own set of characteristics.

Step One: Identify Project Type and Content Areas

Project Type: (Check one*)

___ I. Develop and field test programs and materials.

___ II. Effect institutional change and reform.

___III. Conduct staff development.

___ Other.

Content Areas:

___ A. Career Development (related to programs and materials).

___ B. Occupation/Leadership/Training (related to programs and materials).

___ C. Self Concept (related to programs and materials).

___ D. Sex Stereotyping Behaviors (related to programs and materials).

___ E. Sex Stereotyping Awareness (related to programs and materials).

___ F. Sex Stereotyping Attitudes (related to programs and materials).

___ G. Sex Stereotyping Behaviors (related to institutional change & reform).

___ H. Sex Stereotyping Awareness (related to institutional change & reform).

___ I. Sex Stereotyping Attitudes (related to institutional change & reform).

___ J. Occupation/Leadership/Training (related to staff development).

___ K. Sex Stereotyping Behaviors (related to staff development).

___ L. Sex Stereotyping Awareness (related to staff development).

___ M. Techniques for Coping & Combatting (related to staff development).

___ N. Sex Stereotyping Attitudes (related to staff development).

___ Other.

(Continued)

*Note: If your project fits under more than one type, you may wish to complete a form for each type.

Figure 1 (continued)

Step Two: Identify Project Goals and Objectives

(Check each activity as you complete it.)

___ List (on a separate sheet of paper) the overall goal (purpose) of your project.

___ List (on a separate sheet of paper) the three main objectives of your project.

___ Compare your description of the "project goal" with your check of "project type" in step one. They should match or, at least, be similar.

___ Compare your list of "project objectives" with your checks of "content areas" in step one. They, too, should match or be similar.

Step Three: Identify Project Results

As a further aid in helping you identify characteristics of your project for the purpose of selecting measurement instruments, complete the following activities. Check off each activity as you complete it.

___ List (on a separate sheet of paper) two short-range results you expect to achieve through your project.

___ List (on a separate sheet of paper) two longer-range results you expect to achieve through your project.

___ Compare the results you have described with the check marks you made in step one.

Step Four: Review Instrument Descriptions

___ Read the instrument descriptions from the monograph that fall under the categories you checked in step one (e.g., "I.C." or "II.H.," etc.)

Step Five: Select Instruments

___ After reading the designated instrument descriptions, write down the names of the instruments that seem to fit your needs.

___ Obtain a sample copy of the instrument to review before making a final selection.

___ Make final selection of instrument(s).

6. Recognize the Limitations of the Monograph

Every effort was made to include descriptions of as many useful instruments as possible. However, users must remember that instruments were selected to meet common needs across a number of multi-year projects. Individual projects should not expect to find all the instruments they need for their specific projects in the monograph. For example, one is not likely to find instruments dealing with specific content areas such as physical education, engineering, mechanics, or medicine. Instruments to measure achievement, attitudes, or skills in specific content areas will most likely have to be located in sources other than the monograph. The remainder of this section of the monograph illustrates the use, advantages, and limitations of the monograph.

Plan for Instrument Use

Figures 2 and 3 on the following pages illustrate a plan for selecting appropriate measurement instruments. The plan follows the five basic steps described earlier in this section. Figure 2 represents a school-based project of the "Program and Instructional Materials" type. Figure 3 represents a state-education-agency-based project of the "Institutional Change and Reform" type. Although both examples are based on existing WEEA projects, they do not represent any specific project in their existing form.

Figure 2

PLAN FOR INSTRUMENT USE: EXAMPLE A

Project Title: The Reduction of Sex Stereotyping in High School Physical Education

Type and Content	Goals and Objectives	Outcomes	Instrumentation	Source
1. Program and Instructional Materials	1. To develop and validate a program and materials to:	1. A packaged, transportable program	1. Field test based on pretesting and posttesting using the following instruments:	
a. Self Concept	a. improve self concepts of high school women	a. students will demonstrate a more positive self concept	a. Self-Esteem Questionnaire	a. Monograph
b. Sex Stereotyping Attitudes and Behavior	b. reduce sex stereotyping attitudes about roles and physical activities	b. student will increase options regarding career and social roles of males and females	b. Attitude Toward Women's Roles and/or Sex Role Ideology and Family Orientation	b. Monograph
c. Cooperative and Interactive Behavior	c. increase cooperative and interactive behavior in sports	c. student will increase team skills such as	c. observation instrument	c. search literature (begin with self-designed instrument)
d. Aspirations	d. increase skill (sport) aspirations	d. students will show interest in more sport activities and aspire to a higher level of skill	d. sports interest inventory	d. search literature (begin instruments specifications)
			Personal Attributes Questionnaire	Monograph
e. Fitness	e. increase fitness	e. student will increase endurance and strength	e. skill, endurance, performance test	e. search literature
2. Staff Development Techniques for	2. Provide training to district personnel to:	2. Field tested program for:	2. Field test based on pretesting and posttesting using the following instruments:	
a. Coping and Combatting Sex Stereotyping	a. decrease sex discrimination in policy and priorities	a. increased interest, participation and positive attitudes regarding in-service sessions	a. Kropp-Verner frequency counts	a. Monograph
	b. increase awareness of sex stereotyping in district	b. increased staff awareness of sex discrimination	b. appropriate sections of Complying with Title IX: Implementing Institutional Self-Evaluation	b. Monograph
	c. increase action taken to eliminate sex stereotyping	c. increased group and individual participation in decreasing discriminative practices and policies	c. same as above	c. Monograph

Figure 3

PLAN FOR INSTRUMENT USE: EXAMPLE B

Project Title: Increase Sex Equity in Vocational Education

Type and Content	Goals and Objectives	Outcomes	Instrumentation	Source
1. Institutional Change and Reform	1. To reduce or eliminate sex discrimination in vocational education at the Local Education Agency Level	1. Replicable strategies and instruments for reducing sex discrimination at LEA level.	1. Field test in one LEA using a pre-post test design and a series of unobtrusive measures.	
a. Stereotyping Awareness	a. Increase LEA personnel's awareness of problem.	a. LEA personnel will demonstrate more knowledge of problem and express interest in eliminating the problem (pre-posttest after workshop).	a. Title IX checklist (may require some modification for use)	Monograph
b. Sex Stereotyping Attitudes	b. Change sex discriminatory attitudes of LEA personnel.	b. LEA personnel will demonstrate a change in attitude related to sex appropriateness of jobs, training, and placement.	b. Sex Role Survey (Additional instruments will be necessary).	Monograph
c. Sex Stereotyping Behavior	c. Increase recruitment of women and girls in nontraditional goals and courses.	c. Policy developed to hire more women; policy for recruiting women; increased enrollment by girls in nontraditional classes.	c. Develop unobtrusive measures based on Title IX checklist.	Monograph

CROSS INDEX OF MEASUREMENT INSTRUMENTS

By Type of Project, Content Area, and Target Population

Type of Project:

I. DEVELOPING PROGRAMS AND INSTRUCTIONAL MATERIALS

Content Areas	Target Population: Elementary, K-6	Secondary, 7-12	College and University	Teachers and Administrators	Adults, Employees	Related to Other Content Areas
(A) Career Development						
Assessment of Career Development		X				
California Occupational Preference System		X				B
Career Education Needs Assessment	X	X		X		B
Career Maturity Inventory		X				
Career Role Identification Inventory	X					C,F
Minnesota Importance Questionnaire					X	B
Ohio Vocational Interest Survey		X				B
Planning Career Goals		X				
Strong-Campbell Interest Inventory		X	X		X	
Vocational Interest, Experience, and Skill Assessment		X				
Work Environment Preference Schedule		X	X		X	J
Work Values Inventory		X	X		X	B
(B) Occupation/Leadership/Training						
California Occupational Preference System		X				A
Minnesota Importance Questionnaire					X	A
Ohio Vocational Interest Survey		X				A
Sex Attitude Measure and Sex Stereotype Measure II	X					D,E,F
Women as Managers Scale		X	X		X	F,J,N
Work Values Inventory		X	X		X	A

Type of Project:

I. DEVELOPING PROGRAMS AND INSTRUCTIONAL MATERIALS

Content Areas	Target Population: Elementary, K-6	Secondary, 7-12	College and University	Teachers and Administrators	Adults, Employees	Related to Other Content Areas
(C) Self-Concept						
Adjective Check List			X	X	X	
Career Role Identification Inventory	X	X				A,F
Fennema-Sherman Mathematics Attitudes Scales		X	X			F
Jesness Behavior Checklist		X				D
Mathematics Anxiety Rating Scale		X	X			F
Piers-Harris Children's Self Concept Scale	X					
Self-Esteem Questionnaire	X	X			X	
The Tennessee Self Concept Scale		X	X		X	
Wellesley Role Orientation Scale	X	X	X			
(D) Sex Stereotyping: Behaviors						
Checklists on Sexism and Racism					X	G
Follow-up Questionnaire on the Seminar/ Workshop on Women in the World of Work					X	E,L,M
Guidelines for Assessing Sexism in School and Classroom Practices				X		G,M
Jesness Behavior Checklist		X				C
Personal Attributes Questionnaire			X		X	K,F
Sex Attitude Measure and Sex Stereotype Measure II	X					B,E,F
Teaching Effectiveness Rating Scale				X		K

Type of Project:

I. DEVELOPING PROGRAMS AND INSTRUCTIONAL MATERIALS

Content Areas	Target Population: Elementary, K-6	Secondary, 7-12	College and University	Teachers and Administrators	Adults, Employees	Related to Other Content Areas
(E) Sex Stereotyping: Awareness						
Follow-up Questionnaire on the Seminar/ Workshop on Women in the World of Work					X	D,L,M
Questionnaire on Parent and Educator Knowledge of and Attitudes Toward Sexism and the Law				X	X	L
Sex Attitude Measure and Sex Stereotype Measure II	X					B,D,F
(F) Sex Stereotyping: Attitudes						
Attitudes Toward Sex Roles Scale		X	X	X	X	N
Attitudes Toward Women Scale			X		X	N
Career Role Identification Inventory	X	X				A,C
Feminism Scale			X		X	
Fennema-Sherman Mathematics Attitudes Scales		X	X			C
Mathematics Anxiety Rating Scale		X	X			C
Personal Attributes Questionnaire			X		X	D,K
Sex Attitude Measure and Sex Stereotype Measure II	X					B,D,E
Sex Role Ideology and Family Orientation Scale		X				
Sex-Role Survey		X	X	X	X	
Student Survey, Fourth and Fifth Grade	X					
Women as Managers Scale					X	B,J,N
Women's Liberation Scale			X		X	N

Type of Project:

II. INSTITUTIONAL CHANGE AND REFORM

Content Areas	Target Population: Elementary, K-6	Secondary, 7-12	College and University	Teachers and Administrators	Adults, Employees	Related to Other Content Areas
(G) Sex Stereotyping: Behaviors						
Checklists on Sexism and Racism				X		D
Checklists on Staffing, Analyzing a School Library, and Analyzing an Elementary Reader			X			M
Complying with Title IX: Implementing Institutional Self-Evaluation			X			H,M
Criterion for the Evaluation of Instructional Materials		X	X			M
Guidelines for Assessing Sexism in School and Classroom Practices			X			D,M
Guidelines for Determining Racial and Sexual Discrimination in Schools			X			
SRA Opinion Survey for Men and Women				X		N,I
SRA Opinion Survey for Women				X		N,I
(H) Sex Stereotyping: Awareness						
Complying with Title IX: Implementing Institutional Self-Evaluation			X			H,G
(I) Sex Stereotyping: Attitudes						
SRA Opinion Survey for Men and Women				X		G,N
SRA Opinion Survey for Women				X		G,N
The Social Climate Scales		X	X	X		
Work Atmosphere Questionnaire				X		N

Type of Project:

III. STAFF DEVELOPMENT

Content Areas	Target Population: Elementary, K-6	Secondary, 7-12	College and University	Teachers and Administrators	Adults, Employees	Related to Other Content Areas
(J) Occupation/Leadership Training						
Women as Managers Scale				X		B,F,N
Work Environment Preference Schedule		X	X		X	A,B
(K) Sex Stereotyping: Behaviors						
Evaluation Survey				X		L,N
Examining Sexist Attitudes and Expectations of Teachers				X		L,N
Guidelines for Self-Observation of Teacher Behavior				X		
Personal Attributes Questionnaire			X		X	D,F
Teaching Effectiveness Rating Scale				X		D
(L) Sex Stereotyping: Awareness						
Evaluation Survey				X		K,N
Examining Sexist Attitudes and Expectations of Teachers				X		
Follow-up Questionnaire on the Seminar/ Workshop on Women in the World of Work					X	D,E,N
Questionnaire on Parent and Educator Knowledge of and Attitudes Toward Sexism and the Law				X	X	E

Type of Project:

III. STAFF DEVELOPMENT

Content Areas	Target Population: Elementary, K-6	Secondary, 7-12	College and University	Teachers and Administrators	Adults, Employees	Related to Other Content Areas
(M) Sex Stereotyping: Techniques for Coping and Combatting						
Checklists on Staffing, Analyzing a School Library, and Analyzing an Elementary Reader			X			G
Complying with Title IX. Implementing Institutional Self-Evaluation			X			G,H
Counseling Services Assessment Blank			X			
Criteria for the Evaluation of Instructional Materials			X	X		G
EPIE Career Education Materials Analysis				X		
Follow-up Questionnaire on the Seminar/ Workshop on Women in the World of Work					X	D,E,L
Guidelines for Assessing Sexism in School and Classroom Practices				X		D
Kropp-Verner Attitude Scale					X	
Values Checklist				X		

Type of Project:

III. STAFF DEVELOPMENT

Content Areas	Target Population: Elementary, K-6	Secondary, 7-12	College and University	Teachers and Administrators	Adults, Employees	Related to Other Content Areas
(N) Sex Stereotyping: Attitudes						
Attitudes Toward Sex Roles Scale		X	X	X	X	F
Attitudes Toward Women Scale			X		X	F
Bem Sex-Role Inventory		X	X	X	X	
Chasen Diagnostic Sex-Role Bias Scale				X	X	
Evaluation Survey				X		K,L
Examining Sexist Attitudes and Expectations of Teachers				X		K,L
SRA Opinion Survey for Men and Women					X	G,I
SRA Opinion Survey for Women					X	G,I
Women as Managers Scale					X	B,...F
Women's Liberation Scale			X		X	F
Work Atmosphere Questionnaire					X	I

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Adjective Check List (ACL) (1952)

AUTHOR

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PURPOSE AND USE

The ACL was originally designed as a technique for gathering the observations of staff members in personality assessment. Used with college and adult populations, it can either be administered individually for self-evaluation or used by raters, judges, or observers in research or other situations to record personality attributes of the persons being evaluated. It can also be used "to characterize the ideal self, a legendary personage, a city or state, a commercial product, or almost any other thing."

DESCRIPTION

Development. The ACL, originally used in 1952, has been the subject for many studies. Many different groups have acted as sample populations for validity and reliability studies. A bibliography containing 95 references appears in the manual for the ACL. Gough has recently produced a bibliography of 72 recent studies and completed a current bibliography of 446 references in June 1977. The test publisher distributes a supplementary bibliographic pamphlet. Many of these references contain descriptions of sample groups. In addition to the English language version there are forms in French, German, Hebrew, Italian, Portuguese, and Spanish, although only the English and Italian editions have been standardized so that scores may be graphed on a profile sheet.

Format. The ACL consists of 300 adjectives from which the respondent checks those that apply to herself/himself or to the person(s) being rated. The manual notes 2 formal modes of analysis--the empirical and the rational--in addition to commenting that "the greatest value of the list may accrue from noting, pondering, or analyzing those specific words which an individual or group of individuals has checked as self-descriptive." There are 24 scales on the current profile sheet for the ACL, and from 10 to 15 experimental scales in use by particular investigators.

Designation on Profile Sheet	Name
1. No. Ckd	Total number of adjectives checked
2. DF	Defensiveness
3. Fav	Number of favorable adjectives checked
4. Unfav	Number of unfavorable adjectives checked
5. S-Cfd	Self-confidence
6. S-Cn	Self-control
7. Lab	Lability
8. Per Adj	Personal adjustment

Designation on Profile Sheet	Name
9. Ach	Achievement
10. Dom	Dominance
11. End	Endurance
12. Ord	Order
13. Int	Intraception
14. Nur	Nurturance
15. Aff	Affiliation
16. Het	Heterosexuality
17. Exh	Exhibition
18. Aut	Autonomy
19. Agg	Aggression
20. Cha	Change
21. Suc	Succorance
22. Aba	Abasement
23. Def	Deference
24. Crs	Counseling readiness

Administration. The ACL can be administered to individuals or groups. Completing the ACL takes about 10-15 minutes.

Scoring. The ACL can be hand- or machine-scored. Different answer sheets are needed depending on the scoring mode. The manual includes directions for hand scoring the scales and tables for conversion of raw to standard scores for all ACL scales. The standard scores may be graphed on a profile sheet.

Costs

Specimen set	$3.00
Manual	2.50
ACL	2.75/25, 9.50/100, 45.00/500
Profiles	1.50/25, 5.00/100, 20.00/500
IBM 1230 Answer Sheet	6.00/50, 27.00/250, 50.00/500
NCS Answer Sheets	6.50/50, 12.00/100, 55.00/500
Spanish Test Booklets	.40/each
Answer Sheets	2.50/50

Availability. © 1952 by Harrison G. Gough. The publisher restricts sale of the ACL to persons whose education and/or experience should enable them to use it appropriately. They require that the purchaser complete a qualifications form unless s/he is (1) already listed in the American Psychological Association and the National Vocational Guidance Association Professional Members directories, or (2) employed by and ordering for an educational institution, hospital, social agency, or governmental unit.

RELIABILITY

Internal reliability. From a sample of 100, 5 cases were observed by 10 judges who completed the ACL to describe the assessee. According to the manual, the 5 inter-group reliability coefficients (corrected by the Spearman-Brown prophecy formula) were satisfactory values: .70, .63, .61, .75, and .61, indicating that the ACL can be used by trained observers to describe others.

Stability. For the entire ACL, test-retest reliability ranged from .01 to .86 with a mean of .54. Reliability coefficients were higher for men who were observed to be cheerful, confident, and friendly. More variability occurred in coefficients for men who were observed to be awkward, prejudiced, and arrogant. For the various scales, test-retest reliability was computed after 10 weeks (using a sample of 56 college males and 23 females), after 6 months (using a sample of 100 adult males), and after 5-1/2 years (using a sample of 34 medical students). Most of the scales appear to possess adequate reliability over the 10-week interval, and some (S-Cfd, Dom, and Exh) have surprisingly high stability over the 5-1/2-year interval. However, Lab (lability) and Suc (succorance) scales show rather low reliability. The manual recommends interpreting their results with caution.

VALIDITY

The manual states that extensive data are available on validity. It advises the user to study comparison data from the studies and cautions that the scales are not very strongly related to measures of intellectual aptitude and cognitive functioning. The manual provides "character sketches" on the scales, which, it proposes, contribute to "validity-in-use." Additionally, it reports that most of the scales show an adequate degree of independence although some scales have items in common, which increases their interscale correlations.

OTHER TECHNICAL INFORMATION GIVEN

The author comments that the ACL should be used as a tool, not as a test; that some scoring is done on scales not included in the manual; and that individuals have developed their own scales. He also mentions that nonpsychologists and nonpsychometricians are frequent users.

SOURCE

Consulting Psychologists Press, Inc.
577 College Avenue
P. O. Box 11636
Palo Alto, CA 94306

REFERENCES

Gough, H. G., & Heilbrun, A. B. The Adjective Check List Manual. Palo Alto: Consulting Psychologists Press, 1965.

Gough, H. G. Personal communication, February 25, 1977.

ASSESSMENT OF CAREER DEVELOPMENT (ACD) (1974)

AUTHOR

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PURPOSE AND USE

The ACD was designed for use with students in grades 8-11 as part of a school's developmental career guidance program. It is geared to help counselors and administrators obtain information needed to develop effective guidance programs and assess the outcomes of implemented programs. It focuses on core aspects of career development (occupational awareness, self awareness, career planning knowledge and involvement), and does not claim to measure psychological dimensions of vocational maturity. The ACD is probably the only instrument to assess involvement--which is essentially uncorrelated with knowledge.

DESCRIPTION

Development. The ACD emerged from the combining of 2 lines of research: one aiming to measure the psychological construct, vocational maturity, and another seeking to assess career-related preferences and experiences. When great difficulty was encountered reaching concensus on how to measure "vocational maturity," a more practical approach was taken to develop the ACD further. The ACD consequently emerged as being very similar to an achievement test assessing the amount of knowledge and number of career-related experiences an individual has acquired or had.

The ACD was an outgrowth of the Cognitive Vocational Maturity Test (CVMT) developed by Westbrook in 1970-71. Extensive field tests and revisions led to tryouts of an early ACD in 1971-72. Almost 5,000 students in grades 8-11, from 26 schools representing a broad range of socioeconomic and ethnic backgrounds, were tested. Subsequent nationwide norms are based on a multi-stage probability sample of 28,298 students, in grades 8, 9, and 11, from 197 schools across the nation, tested in the spring of 1973.

Format. The instrument contains 267 items, including 162 items on occupational awareness, 20 on self awareness, 78 on career planning and decision making, and 7 on reactions to career guidance experiences. The ACD is a paper-and-pencil instrument including various types of short-answer items. In addition to the test booklet, students receive a 4-page orientation leaflet. Administrators have access to a Manual of Instructions, a Handbook, and Supplement 1 to the Handbook.

Administration. The ACD can be administered in 3 45-minute sessions or in a 125-minute session. It is designed for group administration by professional educators. Administration directions are provided in the manual.

Scoring. The ACD must be machine-processed and scored by the Houghton Mifflin Scoring Service. Results are mailed within 2-3 weeks after receipt of the forms by the service.

Costs (from the ACD order form)

Item	School Price[1]
Handbook	$ 1.80
Test administrator's manual of instructions	.45
Student test booklets, Form C (pkg/35)	13.95
Supplement 1 to the handbook: A guide for increasing student career development	.60
Introducing the Assessment of Career Development (pkg/35)	4.95
Answer sheets (pkg/35— includes 1 order for scoring service, 1 packing and shipping instructions sheet, 4 ID sheets)	3.75
Examination kit	3.60
Scoring costs:	
Standard service (per student)	.75
Alternate standard service (per student)	.96

Availability. © 1974 by the American College Testing Program.

RELIABILITY

Internal consistency. Split-half correlations were obtained for a 10% sample of norm group students. Reliability estimates for the longer ACD scales were as follows:

Grade	Range of Reliability	Approximate Median[2]
8	.71 - .93	.88
9	.75 - .93	.88
11	.75 - .92	.88

The Handbook states that coefficients for several of the shorter scales are acceptable for interpretation to groups (for which the ACD was designed), though only minimally acceptable for individual interpretations.

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[1] School price includes the regular educational discount. It does not include transportation, handling, or state or local tax. Prices are subject to change.

[2] The values (.88, etc.) apply only to the 6 15-item experience scales.

Stability. Two short-term stability studies were conducted, with a 9-week test-retest interval. One study involved 445 9th graders and the other about 340 11th graders. Tabulated results of the studies appear in the Handbook, which concludes that "prior experience with the ACD has little effect on score level when the ACD is readministered after 9 weeks." Coefficients for the longer ACD scales ranged from .64 to .77 at grade 11. For all of the scales, the lowest and "disappointing" results (.56 and .44) were obtained for the 18-item Occupational Preparation Requirements.

VALIDITY

Content validity. Evidence of ACD validity is shown by its content as detailed in the ACD Content Outline and by the allocation of items according to content area. In addition to the ACT staff, more than 10 career guidance consultants assisted in construction of the ACD and gave further support for its content validity.

OTHER TECHNICAL INFORMATION GIVEN

The Handbook describes additional studies planned or in process concerning such things as the relationship of ACD scales to other standardized tests such as the CPP and DAT; the relationship between various ACD scales and the certainty of occupational choice; the change over time in ACD scales among students exposed (experimentals) or not exposed (controls) to career development programs; and general growth on ACD scales over time. The ACD was the primary instrument used in ACT's Nationwide Study of Student Career Development (Prediger, Roth, & Noeth, 1973).

SOURCE

Houghton Mifflin Co.
5 regional sales offices:

666 Miami Circle, N.E., Atlanta, GA 30324
6626 Oakbrook Blvd., Dallas, TX 75235
1900 So Batavia Ave., Geneva, IL 60134
Pennington-Hopewell Rd., Hopewell, NJ 08525
777 California Ave., Palo Alto, CA 94304

REFERENCES

American College Testing Program. Assessment of career development, handbook, user's guide and report of research. Boston: Houghton Mifflin Co., 1974.

Prediger, D.J., Roth, J.R., & Noeth, R.J. Nationwide study of student career development: Summary of results. (ACT Research Report No. 61). Iowa City, Iowa: American College Testing Program, 1973.

ATTITUDES TOWARD SEX ROLE DIFFERENTIATION IN EDUCATION (A/SRDE) (1976)

AUTHORS

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PURPOSE AND USE

This scale was designed to measure educators' attitudes toward sex role differentiation in the following areas of social interaction: educational, domestic, political, recreational, economic, business, and miscellaneous informal.

DESCRIPTION

Development. This instrument is still in the process of development. Some 127 items comprise the survey, having been selected from a larger pool of items upon the advice of a panel of professors of educational administration and active members of NOW. Thus far, limited data are available on the responses of 1,219 educators to 32 selected items on the scale. In addition, results of the first pilot study of all 127 items are currently being prepared.

Format. The 127-item instrument is a paper-and-pencil Likert-type scale requiring answers ranging on a 5-point scale from "strongly agree" to "strongly disagree." A separate test booklet and answer sheet are available.

Administration. The questionnaire is self-explanatory and could be administered to groups or individuals. Although administration time is not mentioned, 40-45 minutes should be adequate.

Scoring. The authors can provide directions for hand scoring.

Cost. Unknown.

Availability. © November 1976, University Council for Educational Administration.

RELIABILITY

Results from pilot tests should be available in October 1977. Analysis of data from a portion of the first pilot instrument suggests that revised measurement scales and additional research are needed to establish norms and draw comparisons among pertinent groups.

VALIDITY

Construct validity. Responses to the scale were subjected to principal axis factor analysis with varimax rotation. Two major factors emerged—one representing traditional views about sex role differences and one representing support for changing these traditional roles. Identification of these factors supports the authors' purpose in designing the scale to measure educators' attitudes toward sex role differentiation.

SOURCE

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REFERENCES

Silver, P. Personal communication, March 1977.

Silver, P., Podemski, R. S., & Engin, A.W. Attitudes toward sex role differentiation in education: Implications for Title IX implementation. Prepared for Journal of Research and Development in Education for publication Spring 1977. August 2, 1976.

ATTITUDES TOWARD SEX ROLES SCALE (1968)
(REVISED 1977)

AUTHOR

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PURPOSE AND USE

The scale measures responses to commonly held notions of sex-role behavior along a continuum ranging from dichotomous to androgynous. This scale is based on the assumption that some individuals dichotomize attitudes and behaviors believed to be appropriately male or female and that other persons tend to ignore sex-role expectations and see attitudes and behaviors as appropriate to both sexes, that is, they hold androgynous worldviews. It has been used with adult men and women and most recently with young women in high school and their counselors, for whom it was also translated into Spanish. (The English and Spanish versions are in the instrument package.) In the high school setting, the scale was used to measure the ways in which the students and their counselors define femaleness, so that the students, aware of their perceptions, might make better career choices and the counselors, aware of models of feminity different from their own, might avoid stereotype-bound counseling.

DESCRIPTION

Development. The scale was developed to test the hypothesis that men's views of appropriate feminine behavior play a significant although often unrecognized part in the processes underlying women's career development, which make that development different from men's. The pilot study sample consisted of 33 women assigned to one of the following career groups: Homemaker Career, Feminine Career, and Androgynous Career. Twenty persons from similar career groups judged 80 attitudinal or behavioral statements according to their representativeness of current views and sex-role expectancies. The pilot sample then responded to each statement as they thought significant men in their lives would respond. Responses were subjected to a principal-axis analysis; 5 of the 6 factors derived had sufficient item loading to be interpretable. Only items loading on 2 factors at .45 or above were used in the final 35-item instrument. Five subscales (constructs)--Woman as Partner, as Ingenue, as Homemaker, as Competitor, and as Knower--were formed, with 7 items comprising each subscale.

Format. The scale is a Likert-type instrument, consisting of 35 statements to which respondents may agree or disagree at 3 levels of intensity (from "very strongly agree" to "very strongly disagree"). No neutral response is provided.

Administration. The scale was group administered. Thirty minutes should be a sufficient amount of time to complete the scale. Administration directions precede the statements on the scale.

Scoring. The scale is hand scored. A scoring key, including interpretation of scores, appears with the instrument.

Cost. None.

Availability. The scale is not copyrighted and may be reproduced without permission from the author.

RELIABILITY

Internal consistency. 86 women participated in the first study done with this scale, conducted by the author. They were divided into married and not married categories and were assigned to the appropriate career group (Homemaker, N = 33; Feminine, N = 30; Androgynous, N = 23). Average characteristics of women in the Homemaker Career group were 51 years old, 1 year of college, 4 children, and annual income of $19,000; 25 were married and 8 were not. For women in the Feminine Career group, the averages were 35 years old, 4 years of college, 2.4 children, and a combined annual income of $15,000; 13 were married and 17 were not. Average characteristics of women in the Androgynous Career group were 41 years old, 6 years of college, 2.1 children, and a combined annual income of $18,000; 13 were married and 10 were not. Alpha coefficients of internal consistency were obtained for the dependent variables. Reliability ranged from .73 to .83.

A year later Hawley conducted another study with 136 randomly selected women college students who were majoring either in teacher preparation (N = 45), math-science (N = 39), or counseling preparation (N = 52). Mean age of the teacher group was 26.34 years; 21 were married and 18 were not. Mean age of the math-science majors was 26.56 years; 21 were married and 18 were not. Mean age of counselors was 32.81 years; 27 were married and 25 were not. They had an average of 4.7 years teaching experience. Subscale reliability ranged from .70 to .84, and the overall reliability estimate was .93.

In 1975, a revised version of the scale was given to 2,234 female high school students and 65 counselors, 31 of whom were women and 34 men. The students were randomly selected from 12 public high schools and 1 parochial school in Southern California. They were free to take either the English or Spanish version, however, the number who took each version was not recorded. The alpha coefficient (determined using Cronbach's generalization of KR-20) was .86 for the young women and .93 for counselors.

VALIDITY

Construct. All three of Hawley's studies (1971, 1972, 1975) demonstrated that the scale discriminates between groups in the samples. Women's perceptions of male views of the feminine ideal differed significantly depending upon their career group and according to their marital status. Refer to the publications listed in the reference section of this description for further information on development and validity.

Concurrent. In the spring of 1977, Hawley administered her scale and the Bem Sex-Role Inventory (BSRI) to 56 male and female graduate students of Education. It was assumed that each scale measures androgyny. Although no correlation was found between the total scores on the 2 instruments, a number of significant relationships were found between certain items on the Hawley Scale and the "difference" score on Bem's Inventory (Hawley, 1977). (The BSRI is described elsewhere in this monograph.)

OTHER TECHNICAL INFORMATION GIVEN

Kaplan and Goldman (1973) modified Hawley's scale for their study. About 24 male and 30 female college students responded to the items as they believed the average man would respond (stereotypically). The other half of the sample, 25 males and 23 females, responded as they believed the average woman would respond. The average man was seen as viewing women in a more traditional manner than the average woman and the women in the sample perceived more dissimilarity between the average man and woman than did the men in the sample. Also, the 5 subscales were found to be highly intercorrelated.

SOURCE

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REFERENCES

Hawley, P. Empirically-based counseling practices for women. Focus on Guidance, 1976, 8, 1-10.

Hawley, P. Perceptions of male models of feminity related to career choice. Journal of Counseling Psychology, 1972, 19, 308-313.

Hawley, P. Personal communication, June 1977.

Hawley, P. Sex-fair career counseling. National Vocational Guidance Assoc. Tested-Practices Series, 1977 (in press).

Hawley, P. The state of the art of counseling high school girls. Final report. Project No. 0675 P. The Ford Foundation Faculty Fellowship for the Research of Women's Roles in Society. San Diego: San Diego State University, June 1975.

Hawley, P. The state of the art of counseling high school girls. Planning ahead with girls and women: Strategies for action. National Vocational Guidance Assoc., Commission on the Occupational Status of Women Conference, Rutgers University, July 1975 (in press).

Hawley, P. What women think men think: Does it affect their career choice? Journal of Counseling Psychology, 1971, 18, 193-199.

Kaplan, R.M., & Goldman, R.G. Stereotypes of college students toward the average man's and woman's attitudes toward women. Journal of Counseling Psychology, 1973, 20, 459-462.

ATTITUDES TOWARD WOMEN SCALE (AWS) (1972)

AUTHORS

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PURPOSE AND USE

This scale reflects the degree to which an individual holds traditional or liberal views toward women. It taps abstract attitudes and does not necessarily identify the particular roles that an individual has adopted or found preferable for herself or himself. Designed for use with college students or adults, the AWS allows for comparisons of the attitudes of various groups on the role of women in society.

DESCRIPTION

Development. In putting together an initial item pool, Spence and Helmreich attempted to include statements that described roles and behaviors in all major areas of activity in which normative expectations could be, in principle, the same for men and women. The normative population included 420 men and 529 women in introductory psychology classes at the University of Texas at Austin in the fall of 1970 and some 293 men and 239 women in the spring of 1972. Additionally, some 292 mothers and 232 fathers of the second student sample were surveyed. The results of factor and item analysis on the pilot data were used to produce a 55-item scale.

Format. The AWS is a 55-item Likert-type scale. A 25-item version and a 15-item version of the scale are available if time is limited or the test administrator's interest is in a total score rather than responses to specific items. Items on the scale describe the rights and roles that women ought to have or be permitted, vis-a-vis men, in such areas as jobs and education, freedom and independence, social etiquette, sexual behavior, and marital relationships and obligations. Items require responses on a 4-point scale ranging from "strongly agree" to "strongly disagree." The test booklet can be used with separate machine-scorable answer sheets.

Administration. Administration time is not given and varies depending on the form given. A half hour should be adequate for the long form, 15 minutes for the short. The AWS is a self-explanatory questionnaire and could be administered to groups or individuals. Brief directions accompany the instrument.

Scoring. The test may be hand- or machine-scored.

Cost. Specimen copies are available from the authors (no cost). The JSAS document is available for $2.00.

RELIABILITY

Internal consistency. Correlations between scores on the 25-item scale and the full scale were .97 for both 286 male and 241 female students. Similar correlations for 292 mothers and 232 fathers of these students were both .96. Part-whole correlations between total scores on the 25-item version and individual items ranged from .31 to .73 for students (all significant at <.001) and from .14 to .70 for parents.

VALIDITY

Construct validity. The scale was standardized on both male-female groups and parent-student groups to test assumptions that there would be both sexual and generational differences in attitudes toward the proper roles and behaviors of women. Data showed that the means of female students were significantly ($p < .001$) higher (more liberal) than the males, the means of mothers higher than fathers ($p < .01$), and students higher than parents.

Content validity. Data from the norm groups were subjected to an image factor analysis and the resulting G matrices were subjected to a principal-axis factor analysis with verimax rotation. The factors which emerged from each sample group (male-female, father-mother) include such things as traditional marital and family roles, equality of opportunity for women (educational and vocational) and social-sexual roles and behaviors. These factors seem to be similar to the content groupings of items defined by the test authors, and would suggest that the test has reasonable content validity. (Detailed results of the factor analyses are presented in the JSAS document.)

OTHER TECHNICAL INFORMATION GIVEN

Extensive data on the 15-item version are available in a forthcoming book by Spence and Helmreich, The Psychological Dimensions of Masculinity and Femininity, (University of Texas Press, 1978).

SOURCES

Long Version:
Journal Supplement Abstract Service
American Psychological Association
1200 - 17th Street, N.W.
Washington, D.C. 20036
(Manuscript No. 153)

Short Versions:
Janet Spence & Robert Helmreich in
Bulletin of the Psychonomic Society
(see REFERENCES)

REFERENCES

Spence, J. T. Personal communication, March 1977.

Spence, J. T., & Helmreich, R. The attitudes toward women scale: An objective instrument to measure attitudes toward the rights and roles of women in contemporary society. Journal Supplement Abstract Service Catalog of Selected Documents in Psychology, 1972 a, 2, 66.

Spence, J. T., & Helmreich, R. Who likes competent women? Competence, sex-role congruence of interests, and subjects' attitudes toward women as determinants of interpersonal attraction. Journal of Applied Social Psychology, 1972, 2(3), 197-213.

Spence, J. T., Helmreich, R., & Stapp, J. A short version of the Attitudes Toward Women Scale (AWS). Bulletin of the Psychonomic Society, 1973, 2(4), 219-220.

BEM SEX-ROLE INVENTORY (BSRI) (1974)

AUTHOR

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PURPOSE AND USE

The purpose of this instrument is to provide a measure of self-reported personality characteristics that treats masculinity and femininity as two independent dimensions rather than as opposite ends of a single dimension. Using the difference between a person's endorsement of masculine and feminine personality characteristics, a person is classified as masculine, feminine, androgynous, or undifferentiated. A Social Desirability Score can also be computed. Although the inventory was developed with university undergraduates, any group may use it, creating their own median scores for masculinity and femininity.

The author states that she hopes "the development of the BSRI will encourage investigators in the areas of sex differences and sex roles to question the traditional assumption that it is the sex-typed individual who typifies mental health and to begin focusing on the behavioral and societal consequences of more flexible sex-role self-concepts."

DESCRIPTION

Development. During the winter and spring of 1973, 444 male and 279 female students in introductory psychology at Stanford University took the BSRI. It was also administered to 117 male and 77 female paid volunteers at Foothill Junior College (in Palo Alto, California).

Format. The BSRI consists of 60 adjectives--20 adjectives describing masculine characteristics, 20 adjectives describing feminine characteristics, and 20 adjectives describing neutral characteristics (filler items). All adjectives are intermixed to form a single list of characteristics. To complete this paper-and-pencil self-report inventory, a person indicates on a scale from 1 to 7 ("never or almost never true" to "always or almost always true") how well each characteristic describes herself or himself.

Administration. Either individual or group administration is possible; however, for individuals who are not university undergraduates, a group administration will provide the necessary basis for medians for the masculinity and femininity scores.

Scoring. The BSRI can be scored either by hand or by computer. Directions for both procedures are in the scoring packet, which is available from the author. The BSRI Scoring and Interpretation Sheet from the 1977 Annual Handbook for Group Facilitators, cited below, describes procedures for hand scoring the BSRI.

Availability. The author does allow free reproduction of the test, but requires the following copyright statement and provisions:

> Copyright © 1977 by Sandra Lipsitz Bem. Reprinted with permission of the author. This material may be freely reproduced for educational/training/research activities. There is no requirement to obtain special permission for such uses. However, systematic or large-scale reproduction or distribution--or inclusion of items in publications for sale--may be done only with prior written permission of the author.

RELIABILITY

Internal consistency. Coefficient alphas, computed separately for the Masculinity, Femininity, and Social Desirability scores of subjects in each of the 2 norming samples ranged from .70 to .86. The Androgyny difference score, Femininity-Masculinity, which is highly correlated with the Androgyny t ratio, demonstrated a reliability of .85 and .86 with the Stanford and Foothill samples respectively. The Masculinity and Femininity scores are not only logically independent but also empirically independent as well. (Stanford female r = -.14, male r = .11; Foothill female r = -.07, male r = -.02).

Stability. To establish test-retest reliability, the BSRI was administered a second time to 28 males and 28 females from the Stanford normative sample about 4 weeks after the first administration. The product-moment correlations computed for the first and second administrations of the BSRI provided high reliability for the Masculinity, Femininity, Androgyny, and Social Desirability scores (Masculinity r = .90; Femininity r = .90; Androgyny r = .93; Social Desirability r = .89).

VALIDITY

Content validity. For the Masculinity and Femininity scales, the author compiled a list of about 200 personality characteristics that seemed both positive in value and either masculine or feminine in tone. For the Social Desirability scale, she compiled an additional list of 200 characteristics that seemed neither masculine nor feminine in tone. One hundred Stanford undergraduates (50 female, 50 male) rated the desirability of these 400 personality characteristics either "for a man" or "for a woman." The final items for the BSRI were selected on the basis of those rated more desirable in American society for one sex than for the other.

Concurrent validity. Subjects for the test-retest study also filled out the Masculinity-Femininity scales of the California Psychological Inventory (CPI) and the Guilford-Zimmerman Temperament Survey. The author found that the BSRI is not correlated with the Guilford-Zimmerman scale although it

shows moderate correlation with the CPI. She proposes that the fact of the low correlations indicates that the BSRI is measuring an aspect of sex roles which is not directly tapped by either of these 2 scales.

SOURCES

Tests in Microfiche
ETS Test Collection
Educational Testing Service
Princeton, NJ 08540
(Microfiche No. 00-1761)

1977 Annual Handbook for Group Facilitators
John Jones, J. Will Pfeiffer, Eds.
7596 Ends Avenue
La Jolla, CA 92037

REFERENCES

Bem, S. L. The measurement of psychological androgyny. Journal of Consulting and Clinical Psychology, 1974, 42, 155-162.

Bem, S. L. On the utility of alternative procedures for assessing psychological androgyny. Journal of Consulting and Clinical Psychology, 1977, 45, 196-205.

California Occupational Preference System (COPS)
(1974, Revised 1976)

AUTHORS

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PURPOSE AND USE

The COPS is designed to assist junior- and senior-high school and college students in career exploration. It provides job activity interest scores based on 14 occupational clusters. The COPSystem II provides a format to measure career interests of elementary grade students or older students with reading or language difficulties.

DESCRIPTION

Development. In the spring of 1975, 7,000 students in public elementary and secondary schools nationwide took the COPS. To ensure that all geographical divisions would be represented in the norms, the states were grouped in 5 regions for sampling.

Sample size for grades 7 through 12 was as follows:

Sample Size by Grade and Sex

	Grade					
sex	7	8	9	10	11	12
female	346	365	190	174	166	170
male	401	401	181	191	129	138
Total	747	766	371	365	295	308

The manual does not include data on the type of public schools in which testing took place.

Students from a community college and a 4-year college also took the COPS as part of the norming study.

Format. The COPS inventory is a self-administering booklet containing 168 Likert-type items, which are job activity descriptions reflecting work performed in a wide variety of occupations. Student responses range from "like very much" to "dislike very much."

The COPSystem Intermediate Inventory (COPSystem II) is a self-administering booklet with 2 sections, the Inventory section and the Self-Interpretation section. The Inventory section consists of 7 categories, covering educational plans, preferred school subjects, selection of leisure time activities, qualities preferred in a job and the work environment, and items related to the occupational family clusters. The Self-Interpretation section lists the occupational clusters with sample occupations and suggested student activities. Students complete this section by selecting jobs to look up in outside informational resources, such as the Occupational Outlook Handbook.

Administration. The COPS takes about 30 to 40 minutes to complete. Detailed administration directions are given in the technical manual.

Scoring. Two forms of the inventory are available: the self-scoring form (in which responses are marked directly on an expendable test booklet) and the machine scoring form (reusable booklet, responses are marked on a separate answer sheet). A Self-Interpretation Profile and Guide accompanies the self-scoring form. The teacher, counselor, or student uses both documents to produce a profile of occupational interests.

The machine scoring form of the inventory can be used with 2 types of answer sheets read either by the IBM 1232 or the Digitek optical reader. Two options for machine scoring are using your local computer facility or the publisher's data processing services.

The technical manual recommends using the self-scoring form because of the benefits to students from immediate feedback of results and from the process of taking the test, scoring it, and interpreting the scores. Extensive information on scoring and interpreting the scores appears in both the Examiner's Manual and the Self-Interpretation Profile and Guide. Each student obtains scores for the 14 cluster scales and plots a profile based on these scores.

Costs

Self-Scoring Test Booklets (package of 25)	$8.25
Self-Interpretation Profile and Guide (package of 25)	4.75
Machine Scoring Form (package of 25)	9.75

Availability. © 1974 by EdITS/Educational and Industrial Testing Service.

RELIABILITY

Internal consistency. Split-half reliability coefficients for the 14 scales range from .86 to .95.

Stability. Starting in 1975, Knapp and Knapp conducted a test-retest study using an unselected sample of 7th through 11th graders. Retesting took place 1 year later. The technical manual reports results for 497 students (241 female and 256 male), who took the COPS in the 7th grade and a year later in the 8th grade. Stability estimates of interest scores show median correlations of .63.

Short-term stability was demonstrated by administering the COPS to 82 students twice with a 1-week interval between testings. Reliability coefficients ranged from .77 to .93.

VALIDITY

Content validity. Item factor analysis demonstrated content validity of the scales. Using data resulting from cluster item factor analysis, the manual presents tables of the 3 highest loading items on each scale. "In each case, loadings are highest on the scale hypothesized for that activity item."

Concurrent validity. The manual states that correlations have been reported between the COPS and Holland's Vocational Preference Inventory and the Kuder General Interest Inventory. "As would be expected, correlations were highest between the correspondingly named scales of these instruments, ranging generally between .5 and .7."

OTHER TECHNICAL INFORMATION GIVEN

The manual describes in detail the efforts of the authors to eliminate sex bias from the inventory and from its interpretation, and their compliance with Title IX and federal and state legislation.

SOURCE

EdITS/Educational and Industrial Testing Service
P. O. Box 7234
San Diego, Ca. 92107

REFERENCE

Knapp, R. R., & Knapp, L. California Occupational Preference System Technical Manual. San Diego: EdITS, 1976.

CAREER EDUCATION MATERIALS ANALYSIS (1975)

AUTHOR

Women on Words and Images (WOWI)
30 Valley Road
Princeton, NJ 08540

PURPOSE AND USE

The purpose of these analysis sheets is to help educators collect data on the extent to which a career education material (or group of materials) is sexist, based on an analysis of occupations offered to males, females, or both; the number of males and the number of females depicted; the use of language; and the positive and negative images of men and women in the materials.

DESCRIPTION

Development. Women on Words and Images (WOWI), a group of feminist educators in Princeton, prepared these analysis sheets for an analysis of career education curriculum materials they reviewed in 1975 for Educational Products Information Exchange (EPIE), Inc. EPIE itself has been concerned for years about the issues of racism and sexism as they are found in career education materials. As such, EPIE has subcontracted with organizations including WOWI to document the existence of race and sex stereotyping and to develop guidelines by which educators themselves can determine whether materials are racist and/or sexist and can counteract their effects.

Format. The analysis sheet is an open-ended inventory on which the evaluator records descriptive information about the materials being assessed. In addition to basic descriptors such as publisher, title, and grade level range, the evaluator is asked to list the occupations and illustrations included in terms of male, female, or both; examples of how language is used (e.g., use of generic "he"); positive and negative image quotes; and miscellaneous comments.

Administration. The reviewer using this instrument should read chapter 3 of the EPIE Career Education S*E*T*, "Sexism in Materials: How to Detect It and How to Counteract Its Effects in the Classroom," which presents examples of the type of responses used to complete this analysis. A single reviewer, a group of reviewers, or a panel of reviewers working together can use these sheets. Suggested administration directions are included with the instrument.

Scoring. The analysis could include numbers and percentages for each response category and classification and numerical analysis of the comments from open-response questions. Individual users will most likely wish to determine their own scoring and/or evaluation procedures in using this instrument.

Availability. ©1974 by Women on Words and Images.

Cost. $2.50 for Help Wanted.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

OTHER TECHNICAL INFORMATION GIVEN

The EPIE publication and Help Wanted (cited below and used in conjuction with the analysis sheets) present detailed discussion on how to select appropriate career education materials for schools; how to detect and counteract the effects of both racism and sexism in materials; and how to assess publishers' evaluation activities.

SOURCE

Women on Words and Images (WOWI)
30 Valley Road
Princeton, NJ 08540

REFERENCES

EPIE Institute. EPIE Career Education S*E*T* Vol. I. How to select and evaluate instructional materials. New York: EPIE, 1975.

Women on Words and Images. EPIE career education materials analysis. Princeton, NJ: WOWI, 1975.

Women on Words and Images. Help Wanted--Sexism in career education materials. Princeton, NJ: WOWI, 1975.

Career Education Needs Assessment (1975)

AUTHORS

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Glen D. Rask
Colorado State University

PURPOSE AND USE

The 4 instruments in the Needs Assessment package provide a measure of the level of understanding about career education for 4 populations: teachers and administrators and students in grades K-3, grades 4-6, and grades 7-12. The instruments also can provide information on where to place emphasis for career education and which steps need to be taken to integrate career education in the classroom.

The Needs Assessment for Teachers and Administrators provides a means for analyzing the position of teachers and administrators regarding career education and to provide information for planning a career education program. For K-12 students, the instrument is designed to determine the awareness level and needs of students relative to the concepts of career education. The instrument states that "data gathered will be used for program planning only."

DESCRIPTION

Format. The Needs Assessment package contains a separate instrument for each population. For teachers and administrators, the form consists of 4 sections: (1) personal data and work experience, (2) and (3) 2 sections on attitudes and knowledge about career education, and (4) a section on needs. The instrument contains 68 items: 4 open-response items in the personal data section, 2 open-response items in the work experience, 60 Likert-type and multiple-choice items in the attitudes and knowledge section, and 2 open-response items in the needs section. The instrument is a self-contained booklet in which the respondents write their answers.

All 3 student forms are self-contained booklets. For students in grades K-3, the Needs Assessment is an interview form containing 60 items. Part I--Occupational Awareness contains 25 items, Part II--Community Awareness contains 20 items, and Part III--Attitudes and Self-Development contains 15 items.

For students in grades 4-6, the form includes 45 multiple-choice items: 20 in Part I--Occupational Awareness, 15 in Part II--Attitudes and Self-Awareness, and 10 in Part III--Career Development.

For students in grades 7-12, the form includes 45 multiple-choice items: 20 in Part I--Occupational Exploration, and 25 in Part II--Career Guidance and Development.

Administration. The Needs Assessment for Teachers and Administrators is untimed and self-administered. For grades K-3, the "Introduction and Assessment Guide" instructs the interviewer to proceed only through those items designated for a particular grade level. Directions for the interviewer (or teacher acting as interviewer) state that "proper interview technique should be observed." The interviewer reads aloud each item and asks the student to

respond. (For Part I, the correct response follows the item.) The interviewer circles the appropriate letter for the student's response (for Parts I and II, A = correct, B = incorrect, C = no response; for Part III, A = agree, B = disagree, C = no response.) For Part II, the "Introduction and Interpretation Guide" states that "the interviewer must know the community well enough to know which answer is the 'correct' one." For Part III, it provides a guide for scoring the items.

For grades 4-6, the test administrator reads the directions for each part aloud before the students begin. Students have their own booklets in which they mark their responses. The "Introduction and Interpretation Guide" provides a scoring key for Parts I and II and for Part III, states that "this section requires analysis on an individual basis. . . ." It also states that the instrument "is to be used for program planning only; it is not intended to serve as a student interest inventory or for any other diagnostic purpose."

For grades 7-12, test administration is the same as for grades 4-6. The "Introduction and Interpretation Guide" provides scoring for 15 of the 45 items, discusses possible interpretation of the other items, and contains the same caveat on diagnostic use.

The "Introduction and Interpretation Guide" provides some description of how to approach analyzing and using the data.

Scoring. A scoring key and suggested use of scores are provided in the "Introduction and Interpretation Guide."

Availability. © 1975 by Olympus Publishing Company.

Costs

Specimen package	$ 2.50 each
Teachers and Administrators	10.00 package of 25
Students, Grades K-3	10.00 package of 25
Students, Grades 4-6	10.00 package of 25
Students, Grades 7-12	10.00 package of 25

RELIABILITY

Rask stated that reliability was established through use of the "split-half" technique and the Spearman-Brown Prophecy Formula. Reliability scores were:

Teachers and Administrators	r_e = .778
K-Grade 3 Students	r_e = .905
Grade 4-6 Students	r_e = .842
Grade 7-12 Students	r_e = .765

Although the particular reliability sample was not described, Rask commented that the instrument has been used by projects in Kansas, Wyoming, Colorado, California, Nebraska, Guam, and Puerto Rico.

VALIDITY

Content validity. A team of 10 career education experts and 21 teachers using career education in their classes independently reviewed each instrument. The authors revised or eliminated items identified as not consistent with the total instrument or with accepted career education principles.

RESULTS AND COMMENTS

The publisher notes that if "adequate quantities" are requested, a Spanish-language version is available.

SOURCE

Olympus Publishing Company
Two Olympus Plaza
1670 East Thirteenth South
Salt Lake City, Utah 84105

REFERENCES

Blome, A. C., & Rask, G. D. Career education needs assessment introduction and interpretation guide. Salt Lake City: Olympus Publishing Company, 1975.

Rask, G. D. Personal communication, March 8, 1977.

CAREER MATURITY INVENTORY (CMI) (1973)

AUTHOR

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PURPOSE AND USE

The CMI was designed to provide an inventory for assessing career choice attitudes and competencies. It can be used for counseling, evaluation, instruction, research, and as a means of identifying needs in areas of career education. Although designed primarily for students in grades 6-12, it also can be used with elementary level students and adults.

DESCRIPTION

Development. The CMI evolved theoretically with contemporary career development theory, which maintains that vocational behavior matures for most people from late childhood into early adulthood. The combined rational-empirical test methodology has been used as a measurement model in developing the CMI. Items were designed to be as realistic as possible, consistent with the theoretical model of career maturity. A cross-sectional and longitudinal sampling design was chosen for collecting standardization and scoring data on students in grades 5-12. Details regarding item selection and analysis appear in the Handbook.

Format. The CMI includes an Attitude Scale and a Competence Test. The Attitude Scale consists of 50 true-false items representing attitudinal statements in 5 clusters expressing involvement in the career choice process, orientation toward work, independence in decision-making, preference for career choice factors, and conceptions of the career choice process. The Competence Test contains 100 items divided equally into five subtests including Self-Appraisal, Occupational Information, Goal Selection, Planning and Problem-Solving. Hypothetical situations are given and the individual is asked to choose one of five alternatives.

Administration. The entire CMI can be administered, to individuals or groups, in about 2-1/2 hours; 25 minutes are usually adequate for the Attitude Scale or any subtest of the Competence Test. Detailed administration instructions appear in the manual.

Scoring. Scoring can be done by hand for individuals or small groups, or by machine for large groups. Scoring directions are contained in the manual.

Cost. A detailed price list for all tests, answer sheets, and services is available from CTB/McGraw-Hill. Basic costs include the following:

Complete CMI	$22.05/35
Answer Sheet (3 types)	4.00-4.50/50
Scoring Stencil	2.00
Manual	1.25
Scoring Service (entire CMI)	.60/student
Specimen Set	4.75

Availability. © 1973, McGraw-Hill, Inc.

RELIABILITY

Internal consistency. KR-20 reliability estimates for the Attitude Scale range from .65 to .84 with a mean r=.74. This is comparable to the reliability coefficients of similar instruments and consistent with theoretical expectations for a scale designed to measure related but not identical clusters of attitudes. KR-20 values were calculated for each subtest of the competence test and ranged, with only 2 exceptions, from .72 to .90 at all grade levels. In general, "the KR-20's indicate that all five parts of the Competence Test are relatively homogeneous sets of items. . . ."

Stability. The stability coefficient for the Attitude Scale administered twice over a 1-year interval to 1,648 students in grades 6-12 was .71. This seems to be "low enough to allow for maturational variance but high enough to establish systematic measurement of the variable being quantified." Test-retest data for the Competence Test are presently being gathered.

VALIDITY

Content validity. The content of items for both the Attitude and Competence scales were deduced from central concepts of career development theory, and were gathered from the relevant verbal vocational behavior of persons for whom the scales were intended. In addition, 10 expert judges "scored" each item in the Attitude Scale to determine adequacy of the empirical scoring key. Agreement between the judges and the standardization sample was 74%.

Criterion-related validity. The Attitude Scale has been related to several other measures of career maturity, including the Occupational Aspiration Scale and the Readiness for Vocational Planning scales; and to several criterion variables including decisiveness, consistency, and realism in career choice.

"In summary, it is recognized that the N's are smaller than desired in some studies. . ., nevertheless, they generally indicate that the Attitude Scale has demonstrated criterion-related validity."

An analysis of the percentage of overlap of scores on the subtests of the Competence Test from grade to grade sought to relate the test to grade level as a criterion of development. The resulting relationships "are about what would be expected theoretically, given the monotonic model and individual differences in career maturity."

Construct validity. Numerous studies are described in the handbook that support the construct validity of the Attitude Scale. ". . .in general, it appears to be related to variables to which, theoretically, it should be related and unrelated to variables to which it should not be related." The Competence Test was designed to measure the career choice competencies dimension in the model of career maturity. The variables making up this dimension are theoretically interrelated with hypothesized r's ranging from the 40's to the 60's. To determine whether the subparts of the Competence Test were similarly related, product-moment correlations among the subtests were obtained. They range from .25 to .73 with a mean of .54, which agrees with the theoretical expectation.

OTHER TECHNICAL INFORMATION GIVEN

The Theory and Research Handbook presents detailed descriptive and statistical information on the accumulated and in-progress research on the CMI. Particular emphasis is given to item selection and construct validation efforts. The test manual presents detailed scoring information including Percentile Conversion Tables and a table comparing the means of the standardization sample with those of special groups such as blacks and Mexican-Americans.

SOURCE

CTB/McGraw-Hill
Del Monte Research Park
Monterey, CA 93940

REFERENCES

Crites, J. O. Career Maturity Inventory. Administration and use manual. Monterey, CA: CTB/McGraw-Hill, 1973.

Crites, J. O. Career Maturity Inventory. Theory and research handbook. Monterey, CA: CTB/McGraw-Hill, 1973.

Career Role Identification Inventory (1974)

AUTHOR

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American Institutes for Research
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PURPOSE AND USE

The Career Role Identification Inventory was designed to assess elementary students' perceptions of career roles in terms of (A) ideal occupational preference, (B) realistic occupational selection, and (C) sex appropriateness. It was designed for research purposes only.

DESCRIPTION

Development. Items for the 3-part inventory were derived from 3 different sources: Occupational Intentions Inventory (1969), Iglitzin (1970), and Looft (1972). A pool of 60 items was presented to 35 adults asking them to indicate which items were characteristic occupations for men, women, or both men and women. Discriminatory items were based on 95% agreement among the adult population. Items that did not discriminate were eliminated. The remaining pool of items was then administered to a population of 76 3rd, 4th and 5th graders. Discriminatory items were based on 95% agreement among the student population and agreement between adult and student populations. These development techniques resulted in an inventory of 24 items.

Format. The inventory has 3 parts: A, B, and C. All parts of the inventory present identical lists of 24 occupations. Parts A and B record the students' responses in regard to ideal and realistic occupational selection. Part C asks students to decide which occupations on the list are occupations for men, women, or both men and women.

Administration. The inventory is designed for group administration and items may be read aloud to students. Administration directions accompany the intrument.

Scoring. The inventory is designed for hand scoring. Responses to parts A and B are meant to be compared and interpreted according to traditional vs. nontraditional selections by students. Included with the instrument is a scoring key defining traditional and nontraditional choices. For Part C, scores of male and female stereotypy may be computed for each student. Scoring directions accompany the instrument.

Cost. None.

Availability. Users may copy the instrument in the Measurement Instrument Package. The author would greatly appreciate receiving a report of results for purposes of improving the instrument and collecting additional data.

RELIABILITY

Parts A and B were administered twice to a population of 76 3rd, 4th and 5th grade students with a 2 day time interval. Test-retest reliability was computed at .70.

VALIDITY

Content validity. In addition to the discrimination test administered during the developmental stage (as explained above under "Description"), the career role identification inventory was presented to a panel of 2 teachers, 2 counselors and 2 administrators to determine content validity. Content validity was based on: (a) appropriateness to grade level; (b) correlating intent and estimated results of inventory; and (c) representativeness of items.

OTHER TECHNICAL INFORMATION GIVEN

The career role identification inventory was used in a 1974 study of sex role stereotyping among elementary students. Results of the study are available by contacting the author of the inventory.

SOURCE

Beverly J. Parks
American Institutes for Research
P.O. Box 1113
Palo Alto, CA 94302

REFERENCES

Comprehensive Evaluation Project. Stanford: U.S. Office of Education, December, 1969.

Iglitzin, L. B. A child's eye view of sex roles. Paper presented at the American Political Science Association, Washington, D.C., 1972.

Looft, W. R. Sex differences in the expression of vocational aspirations by elementary school children. Developmental Psychology, 1971, 5(2), 366.

Parks, B. J. An exploratory study of the effects of a career oriented curriculum. Greeley: University of Northern Colorado, 1974.

CHASEN DIAGNOSTIC SEX-ROLE BIAS SCALE (DSRB) (1974)

AUTHORS

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Bureau of Child Guidance
New York City Board of Education

Sharon L. Weinberg
Department of Educational Statistics
New York University

PURPOSE AND USE:

The DSRB was designed to measure whether clinicians and others (e.g., teachers) have sex-role stereotypic standards of mental health for girls and boys. In completing the scale, clinicians, teachers, parents, or administrators are asked to give mental health diagnoses of active and passive girls and boys. Possible uses include determining if there are differential expectations among personnel and if such differences run along male/female lines regardless of profession.

DESCRIPTION

Development. Development of the DSRB was based on the literature on sex stereotyping exemplified by Broverman, et al. The normative sample included 120 school psychologists (61 female, 59 male) at the National Association of School Psychologists convention in New York City in March 1973.

Format. The DSRB contains 10 case history descriptions of pre-adolescent students (ages 8-10) to be rated on the following 4 7-point scales:

(1) "Assessment of Health/Pathology" - rated from "extremely unhealthy" to "extremely healthy".

(2) "Assessment of the priority of the referral" - rated from "do not see any problem here" to "refer to school psychologist; urgent"

(3) "Treatment Recommended" - rated from "none" to "extensive psychotherapy"

(4) "With no treatment, what is your prognosis for this child, as an adolescent?" - rated from "extremely unhealthy" to "extremely healthy"

The respondent marks any appropriate point on the 7-point scale.

Administration. The DSRB can be administered to groups or individuals. Administrators must be qualified professionals.

Scoring. Directions for hand scoring are included with the instrument.

Cost. A microfiche from ETS is available for $2.00.

Availability. Contact Chasen for permission to use the DSRB.

RELIABILITY

Stability. A random sample of 10 school psychology and accounting students (from the discriminative validity study) were retested about 3-4 weeks after the first testing, yielding a reliability coefficient of .71.

VALIDITY

Content validity. A panel of 5 school psychologists rank ordered and labeled sex-unspecified case histories in terms of their severity. If cases were truly equivalent, rank orders would be randomly distributed among experts. Since results were mixed, some case histories were revised. The panel labeled cases as independent or dependent; aggressive or non-aggessive, and active or passive, and achieved 100% accuracy of assignment to categories.

A second validation panel of 10 experts rated each case history (again sex unspecified) on a 9-point scale from "in perfect mental health" to "psychotic." Hotelling 1-sample T^2 tests were performed on the cases to determine if they differed from each other by more than chance. Results suggested that differences were probably due to chance, and one can infer that "the paired cases, the 2 pairs within each category, and the active/passive dimensions are similar in severity."

Discriminative validity. Three criterion groups were used for this validity study: 17 female school psychology students, 15 male medical students, and 21 male accounting students. A comparison of mean DSRB scores for the 3 groups shows them to be in the expected direction. A 1-tailed t-test was significant at the .07 level between school psychology and accounting students.

OTHER TECHNICAL INFORMATION GIVEN

Additional statistics include a distribution of case history scores for "Active Boy, Passive Girl, Active Girl, and Passive Boy" for female, male, and total group of school psychologists. The percentage of school psychologists with stereotyped, unbiased, and counterstereotypic diagnostic sex role scores is also given.

RESULTS AND COMMENTS

Chasen and Weinberg found that female school psychologists tended to counter-stereotype girls, rating active girls as "healthier" than passive girls, or passive or active boys. This may reflect "a compensatory diagnostic mechanism perhaps influenced by the Women's Liberation Movement."

SOURCE

Tests in Microfiche
ETS Test Collection
Educational Testing Service
Princeton, NJ 08540
(MF # 008000)

REFERENCES

Broverman, I., Broverman, D., & Clarkson, E. Sex role stereotypes and clinical judgments of mental health. Journal of Consulting and Clinical Psychology, 1970, 34, 1-7.

Chasen, B. Diagnostic sex-role bias and its relation to authoritarianism, sex-role attitudes and sex of the school psychologists. Dissertation Abstracts International, 1974, 35,(5).

Chasen, B. G., & Weinberg, S. L. Diagnostic sex-role bias: How can we measure it? Journal of Personality Assessment, 1975, 39,(6), 620-29.

Chasen, B. Diagnostic sex-role bias and its relation to authoritarianism, sex-role attitudes, and sex of the school psychologist. Sex Roles, 1,(4), 355-368.

Checklists on Sexism and Racism

AUTHOR

Council on Interracial Books
for Children, Inc. (CIBC)
1841 Broadway
New York, N.Y. 10023
(212) 757-5339

PURPOSE AND USE

The Council on Interracial Books for Children (CIBC) developed these checklists to increase the user's awareness of the many forms of racism and sexism in education and to identify specific areas in need of change or improvement.

Evaluators/participants may use these instruments in several ways, including the following: (1) as pre- and post-measures of the effectiveness of a program to reform an institution; (2) as materials for increasing awareness of students, teachers, or administrators; or (3) as a basis for planning strategies for change.

DESCRIPTION

Development. These checklists are part of a "Check Your School (for Racism/Sexism)" packet, which CIBC developed to focus student or teacher discussion of how their school, and most schools, really are and how their school, and most schools, ought to be. The entire packet is included in the Measurement Instrument Package.

Format. The Checklists for Sexism and Racism include 40 and 76 questions respectively, concerning 7 areas as follows:

Area	Number of Items	
	Sexism	Racism
Community	3	5
School Board	6	9
Administration	2	10
Teachers	9	12
Guidance	4	6
Students	8	23
Curriculum	8	11

Questions are answered on a 4-point scale ranging from "yes, always," to "no, never."

Administration. The checklists are designed for group administration. They are administered by a "trainer" after presentation of a variety of support materials including definitions, examples, and statistical facts about racism and sexism. The time required varies depending on the amount of discussion desired, but ranges from 2 to 10 class periods.

Scoring. Evaluators or participants tally the number of responses. Suggested scoring directions are included with the checklists.

Cost. $2.50

Availability. © The Council on Interracial Books for Children (no date given).

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of this scale.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

OTHER TECHNICAL INFORMATION GIVEN

The packet of materials accompanying the checklists includes a descriptive overview, a glossary, examples of institutional racism and sexism in education, an information sheet on the school district, and fact sheets on institutional racism and sexism.

SOURCE

Robert Moore, Resource Director
Council on Interracial Books for Children, Inc. (CIBC)
1841 Broadway
New York, NY 10023

REFERENCES

Council on Interracial Books for Children. School checklist for racism and sexism. New York: CIBC, no date.

Moore, R. B. Personal communication, March 1977.

Checklists on Staffing, Analyzing a School Library, and Analyzing an Elementary Reader (1975)

AUTHOR

Education Committee of
Pennsylvanians for Women's Rights
2307 N. 3 Street
Harrisburg, PA 17110

PURPOSE AND USE

The purpose of the checklists is to focus attention on areas in need of change in a school district, college, or university. They can be helpful in collecting and organizing data from groups of schools or districts.

DESCRIPTION

Development. Developed in 1974 by the Education Committee of Pennsylvanians for Women's Rights, these checklists are part of a booklet, Self Study Guide to Sexism in Schools, which contains additional evaluation criteria for assessing sexism in schools. The Pennsylvania Department of Education has used the Self Study Guide in its efforts to achieve equal educational opportunity for girls and women.

Each section of the Self Study Guide contains a definition of an educational area (such as curriculum or staffing) and a discussion of the impact of sexism in that area; suggestions on how to organize and evaluate that aspect of school life; and a list of additional resource materials.

Format. All 3 checklists contain yes/no items for which the evaluator checks the appropriate response.

The Checklist on Staffing contains a total of 19 items in 5 classifications. The classifications and numbers of items in each are listed below:

Classification	Number of Items
General	3
Hiring Practices	7
Assignment	2
Promotion	5
Retirement and Retrenchment	2

The Checklist for Analyzing a School Library contains 10 items.

The Checklist for Analyzing an Elementary Reader contains 20 items.

Administration. The Self Study Guide recommends that committee whose members are a cross-section of the educational community evaluate sexism in schools. For the checklists, suggested administration directions are included with the instrument.

Scoring. Scoring directions, suggested by AIR, are also included with the instrument in the Measurement Instrument Package.

Cost. None.

Availability. The Self Study Guide states:

> "Permission is granted to reprint this material. Acknowledgement should be to Pennsylvanians for Women's Rights and the Pennsylvania Department of Education."

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of this scale.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

RESULTS AND COMMENTS

The Self Study Guide may be ordered from the Pennsylvania Department of Education.

SOURCE

Pennsylvania Department of Education
Box 911
Harrisburg, PA 17126

REFERENCE

Pennsylvanians for Women's Rights. Self study guide to sexism in schools. Harrisburg, PA: Pennsylvania State Department of Education, 1974.

Children's Sex Stereotypes of Adult Occupations (1977)

AUTHORS

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Department of Educational Foundations
University of New Mexico
Albuquerque, NM 87131

Lynne Kahn
Department of Educational Psychology
Indiana University
2805 E. 10th Street
Bloomington, IN 47401

PURPOSE AND USE

The purpose of this scale is to measure elementary-school children's sex stereotypes about adult occupations in terms of ability (who can be) and prescription (who should be). Using this instrument, Garrett and Ein conducted a study that demonstrated that at least some aspects of children's occupational sex-role stereotypes can be modified through the material they read in school.

DESCRIPTION

Development. This scale was designed to explore age changes and sex differences in the flexibility of children's sex-related occupational stereotypes. Forty occupations were chosen from the SRA Occupation Kit (1964) representing 3 levels of educational requirements and a predominance of male, female, or neutral members. A 5-point pictorial response scale was successfully piloted on 185 elementary level students to determine usability of the response mode. Subsequently, 355 students in grades 1, 3, and 5 from a middle-class suburban school were asked to rate each of the 40 occupations as male, female, or neutral. The scale was then reduced to 21 occupations. These occupations were selected primarily from the 40 used in the initial version of the instrument. This instrument has been used with approximately 900 1st through 5th grade children in 5 schools in 3 midwestern towns and cities. Further studies are in process, using the 21-occupation scale to learn more about the influences on children's gender requirements for adult occupations.

Format. The instrument consists of 3 parts: (1) a language lesson to ensure that the child has been exposed to the difference in meanings among "can," "should," and "is;" (2) directions and 4 examples; and (3) 21 occupations, which the child rates on a 5-point scale ranging from "only women," to "about the same number of women," to "only men." The child responds twice to each occupation, once to the question "who can do it?" and once to "who should do it?" The child's answer sheet uses both words and pictures to describe the 5-point scale.

Administration. The scale can be administered to groups or individuals. The authors tested children in groups ranging from 5 to 30. With younger children and for large groups, several adults, half of them female and half male, should aid the administrator. The adults should also reflect the ethnic background of the children being tested. If the same children are to answer both the "can" and "should" items, then half the children should answer the "can's" first and half the "should's."

Scoring. The instrument can be scored in several ways. (1) The items can be used individually to test the effects of materials designed to change attitudes about specific jobs. (2) Each child can be given 3 scores, obtained by summing the ratings across masculine, across feminine, and across neutral jobs where a job's sex-typing is determined from the census listings of the proportion of each sex doing that job. (3) Each child can be given a total stereotyping score, obtained by reversing the ratings on all jobs that the census indicates are more than 50% filled by men and then summing the ratings on all jobs.

Cost. Garrett currently provides free copies.

Availability. © 1977, by Candace Garrett.

RELIABILITY

Internal consistency. For the 40 item version, 185 1st, 3rd, and 5th grade children from 2 schools served as subjects. To determine reliability, the scoring of female-stereotyped items was reversed to match male-stereotyped items. Thus, a score of 5 meant maximum stereotyping, 3 was neutral and 1 meant reverse stereotyping. For the "can" scale, "the resulting alpha was .85, indicating high internal consistency." For the 21 item version, using 900 1st through 5th graders, coefficient alphas were in the .90s for both the "can" and "should" scales.

Stability. A shortened version of the 40 item scale, including 20 of the more stereotyped occupations, was readministered, at a 1-month interval, to 144 of the sample. The resulting distribution of means pooled across sex and grade was compared to the initial means using a Wilcoxon Matched-pairs signed rank test. The means were stable over time (T=95, N=20, p=<.05). However, 19 of the 20 retested jobs were somewhat less stereotyped at the retesting, due possibly to such factors as a sensitizing effect, social desirability responses triggered by the first testing, or increased cognitive sophistication.

VALIDITY

Construct validity. The children's gender ratings of jobs closely matched reality as seen in census data. In addition, the children saw few occupations as being for women, and many for men, supporting the personal vocation preference research that indicates that boys see more future job possibilities than girls. Finally, the finding that older children have more flexible gender attitudes toward occupations than younger ones gives support to a cognitive component in sex-role stereotyping. In other words, "these results could follow from cognitive structure changes which, according to Piaget and Inhelder (1969),[1] occur across the elementary school years."

[1]Piaget, J., & Inhelder, B. The psychology of the child. New York: Basic Books, 1969

OTHER TECHNICAL INFORMATION GIVEN

Results of the multivariate analysis of variance using the 40 item scale are presented, as well as means, standard deviations, and sample sizes. A summary is available of a 1977 study, using the 21 item version of the scale, and examining the effect of role-reversed stories on children's gender requirements for occupations. Two other researchers have verbally reported to the authors that they have used the scale and have found significant differences in scores between children exposed to non-sexist curricular materials and children not exposed.

SOURCE

Candace S. Garrett
Department of Educational Foundations
University of New Mexico
Albuquerque, NM 87131

REFERENCES

Garrett, C. Personal communication, April 1977.

Garrett, C.S., & Ein, L. The effect of role-reversed stories on children's gender-requirements for adult occupations. AERA abstract, 1977.

Garrett, C.S., Ein, L., & Tremaine, L. The development of gender stereotyping of adult occupations in elementary-school children. Bloomington, In.: Institute for Child Study, 1975.

Garrett, C.S., Ein, L., & Tremaine, L. The development of gender stereotyping of adult occupations in elementary-school children. Child Development, 1977, 48, 507-512.

Garrett, C.S., & Kahn, L. Children's sex-stereotypes of adult occupations, 1977, (a brief description of the scale).

Garrett, C.S., & Kahn, L. Broadening children's stereotypes about sex-requirements for adult occupations: A small grant intervention strategy. Women's Educational Equity Act Grant Final Report, 1977 (in progress).

Ein, P.L. The effects of role-reversed stories on children's stereotyping of occupations. Paper presented at the annual meeting of the American Psychological Association, August 1977, San Francisco.

Complying with Title IX: Implementing Institutional Self-Evaluation (1976)

AUTHORS

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Resource Center on Sex Roles
in Education
1201 Sixteenth St., N.W., Rm. 701
Washington, DC 20036

PURPOSE AND USE

These checklists were developed by Martha Matthews and Shirley McCune of the Resource Center on Sex Roles in Education for the Women's Program Staff in USOE to assist local education agencies in conducting an effective institutional self-evaluation to ensure compliance with the requirements of Title IX. "These checklists suggest general action steps that should be taken in implementing, coordinating, and monitoring an institutional self-evaluation." The Resource Center on Sex Roles and USOE have distributed about 40,000 copies of the booklet containing these checklists, not only to the K-12 personnel for whom they were designed, but also to post-secondary institutions. Another 60,000 copies have been reproduced and disseminated by state and local education agencies.

DESCRIPTION

Development. These checklists were developed in 1975 in response to the requirement that every educational institution or agency receiving federal funds complete a self-evaluation of its compliance with Title IX and make available to the Federal Government this evaluation and related materials. An extensive handbook, of which the checklists are a part, was developed to facilitate such self-evaluation.

Louisiana, Minnesota, Maryland and Pennsylvania are among the states using at least some of the checklists for gathering compliance data. The authors prepared 5 successive drafts of the checklists, which were reviewed by numerous experts in the area of educational equity for women.

Format. The checklists are part of a lengthy handbook for implementing institutional self-evaluation, which covers the following areas: access to courses--general; access to courses--physical education; access to courses--vocational education; counseling; treatment of students including insurance benefits, health services, honors, etc.; student marital and parental status; athletics; financial assistance; and employment. The chapter covering each of the above areas contains a citation of the relevant provisions of the regulation, background information on the issue, an outline of review materials, suggested data to collect, and questions to answer in the self-evaluation; and the action checklist that suggests general action steps needed to implement, coordinate, and monitor the evaluation.

Each checklist addresses several levels of educational administration and has sections to be completed with a "yes" or "no" response by central office staff, building administrators (principals or supervisors), and building staff (instructors or counselors). These checklists provide educational personnel with specific guidelines for the institutional self-evaluation process.

Administration. These checklists and support materials present one possible framework for organizing a self-evaluation under Title IX. Local education agencies must review and adapt the materials according to their own needs, first reviewing them at the central administrative level. After review, the Title IX coordinator may wish to adapt the materials as needed and to delegate responsibility for coordinating the various parts of the evaluation to appropriate staff members. It may be possible in many agencies to reproduce the checklist or other parts of the handbook exactly as they are.

Scoring. The checklists provide educational personnel with an administrative tool for ensuring effective Title IX implementation. Each section also includes questions designed to ascertain compliance with the provisions of the Title IX regulation. Any "no" answer would indicate an area of noncompliance.

Cost. The handbook can be ordered from the Resource Center on Sex Roles in Education for $3.00, prepaid, or from the Government Printing Office for $2.10 plus $1.00 for postage and handling.

Availability. The handbook is published by the USOE and therefore is in the public domain.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of these checklists.

VALIDITY

Content validity. A committee including experts from the Office of Civil Rights reviewed these checklists during their development.

Additional content validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

SOURCES

Resource Center on Sex Roles
in Education
1201 Sixteenth St., N.W., Rm. 701
Washington, DC 20036

Superintendent of Documents
U.S. Government Printing Office
Washington, DC 20402
(Stock # 017-080-01671-1)

REFERENCE

Matthews, M., & McCune, S. Complying with Title IX: Implementing institutional self-evaluation. Washington, D.C.: Resource Center on Sex Roles in Education, 1976.

McCune, S. Personal communication, July 5, 1977.

Counseling Services Assessment Blank (CSAB) (1968)

AUTHORS

James C. Hurst
University of Texas
Austin, TX

Richard G. Weigel
Colorado State University
Ft. Collins, CO 80523

PURPOSE AND USE

The CSAB was designed to provide university counseling centers with a way to describe clients demographically, assess their counseling needs, and evaluate their satisfaction with the counseling services provided. The demographic and needs assessment information provides feedback for program development, while the data on student satisfaction sheds light on program effectiveness. Additionally, it is hoped that the CSAB can be helpful in assessing student and agency changes over time and in making inter- and intra-agency comparisons.

DESCRIPTION

Until 1968, little research had been done on the overall effectiveness of university counseling centers, the assessment of student needs, or the nature of the clients themselves. The CSAB was developed to meet this need. During 1968-1975, normative data were collected from over 13,500 students at 49 American universities.

Format. The CSAB is a 27-item questionnaire including the following: 6 demographic items, 2 self-diagnosis items (rank orders), 16 items requiring client evaluations of self-growth and services provided (Likert-type scales), 2 items requiring client perceptions of the agency's role, and 1 open-ended item. A "Not Applicable" response choice provides flexibility for agencies not offering all of the services listed in the CSAB.

Administration. Although administration time is not mentioned, 10-20 minutes seem adequate. The questionnaire is self-explanatory and is likely to be completed, on an individual basis, by any number of counseling center clients.

Scoring. The test is designed for machine scoring. It is easily tabulated and transferred to data processing equipment. Data processing services, as well as data bank information, are available from the publisher.

Cost. The CSAB manual lists the test costs as follows:

1-499 copies	$10 per 100
500-999 copies	9 per 100
1,000 or more copies	8 per 100

Computer costs are as follows:

Scoring service for individual school data	$25
Size Range composite printout	15
Total data composite printout	15
Cost for above 3 services when ordered simultaneously	50
Postage and handling fee on each order	1

Availability. © 1968, Rocky Mountain Behavioral Science Institute, Inc., Fort Collins, Co.

RELIABILITY

Stability. Two studies conducted by Davidshofer (1975)[1] strongly suggest that the CSAB items are largely stable over time. In the first test-retest study, 56 former clients of the Counseling Center at Colorado State University were asked to complete CSAB's at 1-month and 2-year intervals after counseling. Overall, a moderate to high correlation was reported for each item with responses separated by any of the time intervals. Responses separated by a 1-month interval yielded the highest median correlation of .73, while responses separated by a 2-year interval provided the lowest median correlation of .58. Significance at the .01 level was found for nearly all evaluations.

The second study involved 218 students who had completed CSAB's about a month after counseling. Half this group (experimental) were later asked to complete a second CSAB, with special instructions to be "very frank" in order to eliminate any biasing effect. The other half (controls) were asked to complete another CSAB, but without special directions. (The second return rate for both groups were 79% and 67% respectively.) In this study, highly significant (.01 level) correlations were found for all items over a time interval ranging from 2-6 months. In addition, t-tests were run to test for differences in stability between the experimental and control groups, and showed virtually no significant differences, indicating that the client-counselor relationship does not bias the CSAB self-report.

VALIDITY

Face validity. The publisher states that "The CSAB has high face validity, which facilitates high return when using a mailing technique." This claim is supported by an examination of the items in terms of the relatively straightforward purposes for which they were designed.

Construct validity. An extensive discussion of evidence for the construct validity of the CSAB appears in the CSAB manual. The following points emerge: (1) Self-report is likely to be the best source of demographic data and definition of needs, and as Shoben (1953)[2] has indicated, self-report may be as valid as any other method for measuring therapeutic gain as well. (2) Over 13,000 clients gave rankings of possible causes for their problem areas (vocational, personal, or educational) which seemed to fit theoretical construct for those problem areas; e.g., clients with educational problems

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[1] Davidshofer, C. O. The counseling services assessment blank: Is it reliable? Mimeographed paper. Presented at American Psychological Association Convention, Chicago, 1975.

[2] Shoben, E. J. Some problems in establishing criteria of effectiveness. Personal and Guidance Journal, 1953, 31, 287-291.

tended to identify the cause as lack of environmental information and lack of skill, while clients with personal problems tended to identify the cause as self-conflict. (3) It appears that clients are unbiased in their evaluation of gains, as seen by standard deviations all less than 1.0 on a 5.0 scale, showing that clients gave negative as well as positive ratings. (4) Finally, the highest gain item means were for self-information and environmental information, rather than conflict resolution--a result consistent with expectations that therapists may more readily impart information than solve complex problems of self-conflict.

OTHER TECHNICAL INFORMATION GIVEN

A study is described supporting the hypothesis that agreement of counselor-client diagnoses is positively related to general client-perceived benefits of counseling. Extensive statistics on the norm population are provided in the technical manual.

SOURCE

Rocky Mountain Behavioral Science Institute, Inc.
P. O. Box 1066
Ft. Collins, CO 80521

REFERENCES

Butler, Martha L. Counseling services assessment blank manual. Draft form. Ft. Collins, Co.: Rocky Mountain Behavioral Science Institute, April 1976.

Hurst, J. C., Weigel, R. G., Thatcher, R., & Nyman, A. J. Counselor-client diagnostic agreement and perceived outcomes of counseling. Journal of Counseling Psychology, 16(5), 421-426.

Rocky Mountain Behavioral Science Institute, Inc. The counseling service assessment blank (a brief description). Ft. Collins, Co.: Author, (undated).

Criteria for the Evaluation of Instructional Materials (1976)

AUTHORS

Patrick Ferguson
Department of Secondary Education
University of Alabama
Tuscaloosa, AL 35401

Lois Conley Smith
Carver High School
2001 W. Fairview
Montgomery, AL 36105

PURPOSE AND USE

The criteria were developed for teachers to use informally to evaluate instructional materials for sex-role stereotyping. The authors express that the criteria may also be a useful tool for teachers to demonstrate discriminatory materials to schools boards and other decision makers.

DESCRIPTION

Development. These criteria appear in Chapter 5 of Teaching About Women in the Social Studies: Concepts, Methods, and Materials. In Chapter 5, Ferguson and Smith review some recent studies that have researched the status of sex-role stereotyping in instructional materials and have documented the specific ways in which females are discriminated against (in terms of abilities and personal effectiveness) in school materials and literature. Using primarily the results from 2 of these studies[1] and the guidelines prepared by 2 textbook publishers,[2] the authors developed the criteria in the chapter. They also added elements from their own experiences, which they felt would increase the criteria's usefulness for teachers.

Format. The criteria are in outline form and are grouped into 5 main categories. These categories are Visibility of Males and Females, Role Models: Male and Female, Behavior, Language, and Parallel Treatment. Several criteria are listed under each heading; a total of 36 criteria are presented. The remainder of the chapter explains specifically what the criteria mean, gives examples, and discusses how to use the criteria.

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[1]Weitzmann, L.J., Eifler, D., Hokada, E., & Ross, C. Sex role socialization in picture books for children. American Journal of Sociology, 1972, 77, 1125-1149.

Women on Words and Images. Dick and Jane as victims: Sex stereotyping in children's readers. Princeton: Central New Jersey National Organization for Women, 1972.

[2]Guidelines for equal treatment of the sexes in McGraw-Hill Book Company Publications. Manchester, Mo.: McGraw-Hill Publishers. (undated)

Guidelines for improving the image of women in textbooks. Glenview, Il.: Scott, Foresman and Company, 1974.

Administration. The authors give a step-by-step procedure for evaluating instructional materials and note that book selection committees and supervisory personnel may want to conduct more comprehensive investigations.

Scoring. The suggested procedure for teachers is first to construct a tabulation sheet by category, on which they can record the frequencies and percentages of males and females that are represented in the material being evaluated. Teachers then determine the frequencies and percentages and record those data on the tabulation sheet. The final step is to compare the results and formulate their own conclusions about the extent of sex discrimination in the material evaluated. The authors suggest courses of action that may be taken if discriminatory materials are identified and suggest more formal evaluation approaches to take if the guidelines are to be used for a committee report or published document.

Cost. The Bulletin in which the guidelines appear costs $5.95, plus $.70 for shipping and handling, and may be purchased from the National Council for the Social Studies.

Availability. © 1976 by the National Council for the Social Studies and the editor. Permission to reprint material from the Bulletin must be obtained from the National Council for the Social Studies. No royalty fee was charged for permission to reproduce the criteria for the instrument package. Fees may be charged for other uses.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of this instrument.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

SOURCE

Treatment of the sexes in instructional materials: Guidelines for evaluation, Chapter 5 in Teaching about women in the social studies: Concepts, methods, and materials, Bulletin 48.

Jean Dresden Grambs, Editor
National Council for the Social Studies
2030 M Street NW - Suite 406
Washington, DC 20036

REFERENCES

Ferguson, P. Personal communication, March 1977.

Grambs, J. D. (Ed.) Teaching about women in the social studies: Concepts, methods, and materials. Bulletin 48. Washington, D.C.: National Council for the Social Studies, 1976.

EVALUATION SURVEY (1977)

COMPILER

Jo Renee Fine
WNYE-TV
112 Tillary St.
Brooklyn, NY 11201

PURPOSE AND USE

This survey was developed by a WEEA project (Venture Beyond Stereotypes) to provide data on the attitudes, behaviors, and knowledge of elementary and secondary school teachers concerning sexism. It was used to evaluate the effectiveness of a series of workshops on sexism in education.

DESCRIPTION

Development. Fine developed and adapted items after review of many sources on sexism in education. She conducted a pilot study with 50 workshop leaders and students in a graduate-level class on measurement and evaluation at New York University, who provided feedback on the items. After revising the test, Fine administered it as part of the project evaluation for "Venture Beyond Stereotypes." Her current study includes 200-250 elementary and secondary school teachers who are participants in workshops on sexism in education.

Format. The survey contains 74 items in 4 parts. Part I, Opinions, has 41 items; Part II, School Situations, has 12 items; Part III, Language and Materials, has 9 items; and Part IV, Facts, has 12 items. Part I contains 2 sections. Section A (28 items) uses a 7-point Likert-type scale with responses ranging from +3 "agree strongly" to -3 "disagree strongly" (a "no" response is given a value of 0). Respondents write the number reflecting their opinions on a line in front of each item. In Section B (13 items), the respondent checks 1 of 4 options regarding various behaviors: "OK for Girls", "OK for Boys", "OK for Both", or "Not OK for Either."

Part II also contains 2 sections. For Section A (10 items), the respondent checks 1 of 4 options indicating the frequency of specific classroom situations: "Often", "Sometimes", "Never", or "Does Not Apply." For Section B (2 items), the respondent checks "yes" or "no," adding an open-ended response if "yes" is checked. Part III includes 2 types of items: Type 1 (7 items) for which the respondent indicates a change in wording or checks "no change" and Type 2 (2 items) for which the respondent checks "yes" or "no," adding an open-ended response if "yes" is checked. Finally, Part IV includes 2 types of items: Type 1 (11 items) for which the respondent checks "true", "false", or "not sure" and Type 2 (1 item) open response.

Administration. About 30 minutes is the suggested administration time. Group and individual administration are both possible. (The current study suggests letting respondents who need more time take the questionnaire home to finish it.) Administrators are advised to stress the importance of honest responses.

Scoring. Fine will provide complete hand- and computer-scoring directions.

Cost. $2.00 for microfiche from ETS.

Availability. Although this survey form is not copyrighted, users should contact Fine for permission to copy and use it.

RELIABILITY

At the present time, Fine is analyzing data on reliability.

VALIDITY

Content validity. Test content is based on a study of the literature on sexism in education. Items were reviewed by workshop leaders and graduate students in measurement and evaluation.

RESULTS AND COMMENTS

This survey is part of the comprehensive evaluation of Venture Beyond Stereotypes. Two related measures administered as part of that evaluation were an activities questionnaire and a broadcast questionnaire, which are available from Fine.

SOURCE

ETS Tests in Microfiche
ETS Test Collection
Rosedale Road
Princeton, NJ 08540

REFERENCE

Fine, J. Personal communication, March 1977.

EXAMINING SEXIST ATTITUDES AND EXPECTATIONS OF TEACHERS (1975)

AUTHORS

Margot Stern Strom
Iris Sue Feldman
Lawrence School
27 Francis St.
Brookline, MA 02146

PURPOSE AND USE

The purpose of these guidelines is to help elementary and secondary teachers analyze their own behavior and attitudes and the materials they use in their classrooms. Suggestions for non-sexist activities appear in the handbook cited below, under SOURCE.
A checklist version of the guidelines was developed by AIR so that teachers and/or observers could use a rating scale in regard to the questions raised in the original guidelines.

DESCRIPTION

Development. These guidelines appear in Sex-Role Stereotyping in the School: A Handbook for Teachers in the Public Schools of Brookline, Massachusetts by Margot Stern Strom and Iris Sue Feldman. The authors based some of the content on Nonsexist Curricular Materials for Elementary Schools, edited by Laurie Olsen Johnson, published by the Feminist Press (Box 334, Old Westbury, NY, 11568). All Brookline faculty members receive a copy of the handbook.

Format. These guidelines present 32 questions on 5 areas of teacher behavior and attitudes toward students, including: I. Behaviors (3 questions), II. Academic Performance (4 questions), III. Socialization (15 questions), IV. Extracurricular activities (4 questions), and V. Classroom/School Organization (6 questions). In their original format, the questions are for self-observation. Included with the instrument is an alternative format that could be used by teachers or observers as a rating scale.

Administration. Currently, the guidelines are designed for self-administration. Suggested administration directions are included with the instrument.

Scoring. Suggested scoring directions are included with the instrument.

Cost. $2.00 for the handbook.

Availability. The handbook is © 1975 by Margot Stern Strom and Iris Sue Feldman.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of this instrument.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

RESULTS AND COMMENTS

The authors would appreciate receiving information on the results of use of these guidelines.

SOURCE

Dr. Jacqueline Clement
Assistant Superintendent of Schools
Brookline Public Schools
Town Hall
Washington Street
Brookline, MA 02146

REFERENCES

Feldman, I. Personal communication, March 9, 1977.

Feldman, I. Personal communication, March 11, 1977.

Strom, M. S., & Feldman, I. S. Sex-role stereotyping in the school: A handbook for teachers in the public schools of Brookline, Massachusetts. Brookline, Ma.: Public Schools of Brookline, 1975.

FEMINISM SCALE (1972)

AUTHOR

Judy Dempewolff
34 Cottage St.
Natick, MA 01760

PURPOSE AND USE

The Feminism Scale was designed to measure attitudes toward the aims of the women's movement (defined by the author as "the attempts to bring about a change in the role and status of women in the direction of equality with men"). It may be used with students and staff in an institution similar to the University of Cincinnati.

DESCRIPTION

Development. Dempewolff conducted a pilot study in which she surveyed various individuals and groups with known views about the women's movement: married and unmarried male and female graduate students, female physical therapists, secretaries and their boyfriends.

Format. Three forms of the Feminism Scale are available: a long form (56 items) and 2 short forms, A (28 items) and B (28 items). Each of the short forms contains one-half of a pair of items, one endorsing feminism, and the other (with approximately the same content) supporting traditional roles. All 3 forms are paper-and-pencil, 4-point Likert-type scales, ranging from "agree very much" to disagree very much."

Administration. Although administration time is not mentioned, 10-15 minutes seems adequate.

Availability. © 1972, Dempewolff. Potential users must obtain permission from the author and document their use.

Scoring. Hand scoring procedures are included with the scale.

Cost. $3.00 handling fee

RELIABILITY

Internal consistency. Dempewolff (1974) reports a Spearman-Brown r of .96 for a sample of 225 students (106 men and 119 women) from an introductory psychology class at the University of Cincinnati. Parallel forms reliability estimate for matched halves yields .96 for the short form and .98 for the total scale.

Stability. Two groups of 25 introductory psychology students at the University of Delaware took 1 of the short forms and after 2 weeks took the alternate form. Data from their scores produced a correlation coefficient of .92 between Form A and Form B, establishing a parallel forms reliability estimate of .95.

VALIDITY

Known-groups validation. Dempewolff studied 154 students who were members of selected groups or organizations at the Univeristy of Cincinnati (a. 42 men from ROTC or a conservative fraternity: b. 44 women from Angel Flight, Bearkittens, or a conservative sorority; and c. 68 men and women who supported the aims of the women's movement--from a women's seminar, women in a women's studies course, McGovern supporters, Zero Population Growth, and Student Community Involvement Program). Subjects completed the Feminism Scale, Social Distance Scale, Independence of Judgment Scale, Modernism II Scale, and demographic and family background items.

Means and standard deviations for those groups (presented in the table below) supported the author's hypothesis that members of selected groups would oppose or support the women's movement, depending upon their general political outlook.

MEANS AND STANDARD DEVIATIONS OF FEMINISM II SCORES AS A FUNCTION OF ORGANIZATIONAL MEMBERSHIP AND SEX[1]

Organizational Membership Group		Men	Women	*M*
Supporters of women's movement	*M*	181.37	207.15	193.88
	N	35	33	68
	SD	21.52	16.47	
Opposers of women's movement	*M*	141.37	162.63	152.74
	N	42	44	86
	SD	27.07	22.26	
M, combined groups	*M*	160.04	181.23	
	N	75	79	

OTHER TECHNICAL INFORMATION GIVEN

Dempewolff presents short means for males and females, 3 analyses of variance of autonomy measures as a function of feminist attitude and sex, and mean scores on each item for males and females.

SOURCE

Judy Dempewolff
34 Cottage St.
Natick, MA 01760

REFERENCES

Dempewolff, J. Development and validation of a feminism scale. Psychological Reports, 1974, 34, 651-657.

Dempewolff, J. Some correlates of feminism. Psychological Reports, 1974, 34, 671-676.

Dempewolff, J. Personal communication, March 1977.

[1] from Dempewolff (1974), page 656.

Fennema-Sherman Mathematics Attitudes Scales (1976)

AUTHORS

Elizabeth Fennema
Julia A. Sherman
School of Education
University of Wisconsin
Madison, WI 53706

PURPOSE AND USE

The Fennema-Sherman Mathematics Attitudes Scales are 9 domain specific scales designed to assess a variety of attitudes toward the learning of mathematics. The scales were designed for use with students, junior high school age or older, primarily for research purposes.

DESCRIPTION

Development. The Fennema-Sherman Mathematics Attitudes Scales were developed to study attitudes toward mathematics in order to improve the learning of mathematics. The attitudes to be measured were those hypothesized to be related to the learning of mathematics by all students and/or to the cognitive performance of females.

Nine separate scale dimensions were defined, and items were written. Eighteen to 22 items per scale were selected for an initial pilot test. This 173-item test was administered to 367 subjects in grades 9-12 in a middle-class, suburban/rural school. Both students taking math and those not taking it were included in the sample. Results from the pilot test were analyzed and final selection of items was made. The revised scales were subsequently administered in their entirety to math students from 4 Madison, Wisconsin, high schools in the winter of 1975, and to students in grades 6-8 in the winter of 1976.

Format. The Fennema-Sherman Mathematics Attitudes Scales have the following 9 scales: Confidence in Learning Mathematics (C); Mother (M), Father (F), and Teacher (T) scales measuring perceptions of attitudes toward one as a learner of math; Attitude Toward Success in Mathematics (AS); Mathematics as a Male Domain (MD); Usefulness of Mathematics (U); Mathematics Anxiety (A); and Effective Motivation in Mathematics (E). Each scale consists of 6 positively-stated and 6 negatively-stated items with a 5-point Likert-type response scale ranging from "strongly agree" to "strongly disagree." The scales can be used separately or together in any combination, in which case the items from 2 or more scales would be randomly distributed into 1 instrument.

Administration. The scales are self-administering and can be given to groups or individuals. Time required for testing depends on the number of scales used, allowing 10-15 minutes per scale. Further information on development and use are given in the JSAS document cited in the references.

Scoring. The scales can be hand- or machine-scored, and can easily be set up for use with machine-scorable answer sheets. Further information on scoring and/or use of scores is available from the JSAS document.

Cost. $5.00 for the JSAS Manuscript No. 1225, including all the scales.

Availability. The scales were developed with National Science Foundation funds. Therefore, they are in the public domain and required no special permission for use or duplication. The authors do request, however, that proper authorship is credited.

RELIABILITY

Internal consistency. Split-half reliabilities for all 9 scales ranged from .86 to .93 with a median of .88.

VALIDITY

Content validity. Content validity was established in developing the scales. Each scale dimension was defined and item writers judged the validity of the other author's items. "Items which were agreed upon as measuring an aspect of the dimension were selected with attention being given to covering the range of the dimension."

Construct validity. In the final selection of items, a certain degree of construct validity was assured. Items were selected based on pilot test statistics. Two criteria relating to construct validity were used: Items that yielded results consistent with the theoretical constructs of the scale and items that differentiated math and non-math students were chosen. In addition, intercorrelations of the various scales show that "while the scales are interrelated, each scale measures a somewhat different construct."

OTHER TECHNICAL INFORMATION GIVEN

The JSAS document provides additiona data on the Mathematics Attitudes Scales as follows: N's, F-values of grade X sex analyses of variance; intercorrelations among Mathematics Attitudes Scales; results of principal components factor analysis; and descriptive statistics.

SOURCE

Journal Supplement Abstract Service
American Psychological Association
1200 - 17th Street, N.W.
Washington, D.C. 20036

(Manuscript No. 1225)

REFERENCES

Fennema, E. Personal communication, May 1977.

Fennema, E., & Sherman, J. Fennema-Sherman mathematics attitudes scales. Journal Supplement Abstract Service Catalog of Selected Documents in Psychology, 1976, 6(1), 31. (Ms. No. 1225)

FOLLOW-UP QUESTIONNAIRE ON THE SEMINAR/WORKSHOP ON WOMEN IN THE WORLD OF WORK (1974)

AUTHOR

Mary L. Ellis
Ellis Associates, Inc.
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College Park, MD 20740

PURPOSE AND USE

This measure was developed for the purpose of evaluating the Regional Seminar/Workshop on Women in the World of Work conducted by Technical Education Research Centers, Inc., sponsored by the U.S. Office of Education, in cooperation with the Center for Occupational Education, North Carolina State University.

The purpose of the questionnaire is to determine (1) the attitudes of participants toward women in the world of work, (2) the reactions of participants to the workshop/seminar, (3) the actions participants have taken toward issues discussed in workshops, and (4) the participants' understanding of the problems confronting women in education and employment.

DESCRIPTION

Development. In 1973-74, the Seminar/Workshop was conducted throughout the U.S. to further the professional development of leaders in vocational-technical education. During the workshop, distinguished people spoke on such topics as the composition of the labor force, laws on equal education and employment opportunities for women and associated problems, and women's movement issues. In July and August 1974, a follow-up survey of 218 participants was conducted using this questionnaire. Ellis received 179 responses (82.19%).

Format. The questionnaire consists of 26 questions to which participants respond "yes" or "no." Questions pertain to the perceived favorableness of the workshop, the perceived changes in participants' attitudes and behaviors, attitudes toward women in the world of work, and relevant activities engaged in by participants following the workshop. In addition, a "comments" space is available for listing any other relevant activities engaged in by participants and/or additional comments.

Administration. The questionnaire is administered to participants following the workshop/seminar and is to be returned to appropriate people within 10 days. Suggested administration directions are included with the instrument.

Scoring. The questionnaire can be hand-scored by tallying responses under each category (yes, no, no response). Percentages and means can be computed for each item. The "comment" section should be classified under different categories of activities and comments listed. Suggested scoring directions are included with the instrument.

Availability. This work was funded by the U.S. Office of Education and is therefore in the public domain. It can be reproduced or modified without special permission.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

OTHER TECHNICAL INFORMATION GIVEN

The project report includes extensive background information on the social and psychological influences affecting women's status and equality, a discussion of policies and practices suggested by workshop participants to correct discrimination against women in education and employment, and a discussion of immediate outcomes of the workshops. Appendices also include workshop presentations, questionnaire results, an agenda and participant lists, and a bibliography.

SOURCE

Mary L. Ellis
Ellis Associates, Inc.
P.O. Box 466
College Park, MD 20740

REFERENCE

Ellis M. L. (Ed.), Women at work. Career and Vocational Development Report No. 16. Raleigh: North Carolina State University School of Education, 1974.

GUIDELINES FOR ASSESSING SEXISM IN SCHOOL AND CLASSROOM PRACTICES (1976)

AUTHORS

Judith G. Zamost
Sylvia D. Feldman
Office of Equal Educational Opportunity
New Jersey State Deparment of Education
225 West State Street
P.O. Box 2019
Trenton, NJ 08625

PURPOSE AND USE

These guidelines were developed specifically to assist New Jersey school districts in assessing their affirmative action programs for ensuring equal educational opportunities for males and females. Each district is required to write a viable affirmative action plan. The guidelines were written with the state's EEO regulations (Title 6) and with the federal regulations (Title IX) in mind. (The state Title 6 regulations are included with a copy of the guidelines in this package.) The introduction states that the checklists should be helpful at all stages of a district's assessment and that they should stimulate thinking and elicit other questions from school decision makers about the degree to which a district really does provide equal educational opportunities for all its students. Some questions probe into subtle forms of discrimination, for example, placement of books in the library. Guidelines were distributed to districts in New Jersey upon request.

DESCRIPTION

Development. The guidelines were developed by staff in the state's office of Equal Educational Opportunity, using their own experiences and other published guidelines. As the guidelines were developed, they were reviewed informally in the EEO office.

Format. The guidelines are contained in a 16-page booklet. They are grouped into 7 areas -- School Practices Which Deal with Sex Stereotyping, Textbook and Materials Evaluation, Counseling Opportunities, Pregnancy or Related Conditions, In-Service Training, Physical Education, and Equal Opportunity for Both Sexes in Team Sports. Each heading is followed by several specific questions, 125 in all, relating to school practices. Space is provided to the right of the questions for responding to them (either yes or no) and for making comments or suggestions. A chart developed by the KEDS General Assistance Center at Kent State University (for determining equality of athletic programming) appears at the end of the booklet.

Administration. The guidelines can be used by administrators, teachers, or other interested school personnel to assess their school's practices. Administration directions are suggested by the authors in the guidelines.

Scoring. After responding to the questions and tallying the number of "yes" responses, districts can "check their balance" against a guide at the end of the booklet, which indicates points according to the number of "yes" responses whether the district is engaged in unequal educational practices.

Cost. A minimal charge may be necessary for distributing copies of the guidelines. This figure will be determined on the basis of demand.

Availability. Contact the Office of Equal Educational Opportunity at the New Jersey State Department of Education for copies of the guidelines.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of the guidelines.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

SOURCE

Office of Equal Educational Opportunity
New Jersey State Department of Education
225 West State Street
P.O. Box 2019
Trenton, NJ 08625

REFERENCES

Thomas, N. E. Personal communication, March 1977.

Zamost, J. Personal communication, March 1977.

Guidelines for Determining Racial and Sexual Discrimination in Schools (1973)

AUTHOR

National Education Association (NEA)
1201 Sixteenth Street, N.W.
Washington, D.C. 20036

PURPOSE AND USE

The guidelines were designed to help educators determine the degree of racial and sexual discrimination in their schools as a step in trying to combat that discrimination.

DESCRIPTION

Development. The guidelines were developed on the motivating assumptions that "equality of opportunity is a fundamental goal of our democratic society;" that "schools represent one of the institutions crucial to the achievement of that equality;" and that discrimination based on sex and race exists. The NEA enlisted the cooperation of the Resource Center on Sex Roles in Education, the National Foundation for the Improvement of Education, and the Project on the Status and Education of Women in preparing a document to help combat that discrimination. The Guidelines are a part of that document, which also outlines the federal laws and regulations prohibiting discrimination in educational institutions and programs, and provides a list of institutions and publications that offer help in combating discrimination.

Format. The Guidelines include checklists and open response items covering the following 6 areas: School Leadership and Personnel (7 item areas); School and Class Assignment (6 item areas); Curriculum Development and Materials (9 item areas); Counseling and Guidance Programs (7 item areas); Sports and Extracurricular Activities (7 item areas); and Teacher and School Staff Behavior (7 item areas).

Administration. As a self-help measure, the Guidelines are self-administered on an individual, voluntary basis. The reference cited below describes utilization of these guidelines.

Scoring. Respondents are responsible for "scoring" and assessing the significance of responses in terms of their own institutional needs.

Cost. The Guidelines are a part of the reference cited below and can be obtained from the NEA for $1.25.

Availability. © 1973, National Education Association of the United States.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of these guidelines.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

SOURCE

The guidelines are part of the booklet referenced below, which may be ordered from:

NEA Order Department
Academic Building
Saw Mill Road
West Haven, CT 06516

(Stock No. 385-11604)

REFERENCE

National Education Association. Combating discrimination in the schools: Legal remedies and guidelines. Washington, D.C.: NEA, 1973.

GUIDELINES FOR SELF-OBSERVATION OF TEACHER BEHAVIOR (1975)

AUTHORS

Margot Stern Strom
Iris Sue Feldman
Public Schools of Brookline
Brookline, MA 02146

PURPOSE AND USE

The Guidelines for Self-Observation of Teacher Behavior were designed to help elementary and secondary school teachers analyze their own behaviors, attitudes, and use of classroom materials in terms of sex-role stereotyping. They are an intrinsic part of a program in the Brookline Public Schools designed to reduce sexist attitudes and behaviors in the schools. In their current form, the guidelines are intended for use by teachers for self-observation and subsequent modification of behaviors and attitudes; however, they could be adapted for use by outside evaluators as well.

DESCRIPTION

Development. The Directors of Instruction in the Brookline Public Schools requested development of such guidelines. In 1972, the Brookline Public Schools formed a committee to deal with the issue of sex-role stereotyping in the schools. This committee had worked to identify issues of sex-role stereotyping vis-a-vis curriculum, learning materials, physical education and athletics. Two staff volunteers prepared a handbook (as an outgrowth of committee work) including suggestions for activities and materials to enable the schools to minimize sexist behaviors and attitudes. The guidelines, a major component of the handbook, were sent to Directors of Instruction in Brookline, so they could include issues related to sex-roles in their evaluation of teacher performance.

Format. The guidelines consist of 12 groups of questions for teachers to answer as a result of self-observation. The questions pertain to distinctions in the treatment of boys and girls in the classroom, and cover the following areas: sex-delineated areas in the classroom (e.g., boy books and girl books); sex delineated activities or roles; dominance of males or females in examples used in class discussions or bulletin board displays, in who does heavy chores in the class, and in who does secretarial chores; behavioral expectations for each sex; differential display of affection and displeasure; differential administration of censure, punishment, and reward; and verbal cues for sex-role behavior. Questions are open-ended and unstructured.

Administration. The guidelines are self-administering in their current format. By modifying the format to provide response categories, an outside observer could evaluate the behaviors. The evaluator could then record and tally the responses (whether from self- or other-observation). Several observations, but at least pre- and post-observations, of a classroom involved in a non-sexist learning project would provide comparison data. As with other measures of this type, the evaluator needs to outline criteria for "improvement" or "acceptable" responses.

Scoring. The guidelines are self-"scored." If adapted for objective-referenced evaluation, an evaluator could tally and hand-score responses.

Availability. © 1975 by Margot Stern Strom and Iris Sue Feldman.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of these guidelines.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

OTHER TECHNICAL INFORMATION GIVEN

The handbook cited below also includes laws pertaining to sex discrimination in education, regulations pertaining to access to equal educational opportunity, examples of curriculum materials in Brookline, studies bearing evidence of sex-role stereotyping, other steps to be taken to minimize such stereotyping, and resources available in Brookline to help meet the program goals.

SOURCE

Public Schools of Brookline
Brookline, MA 02146

REFERENCE

Strom, M. S., & Feldman, I. S. Sex-role stereotyping in the school: A handbook for teachers in the public schools of Brookline, Massachusetts. Brookline, MA: Brookline Public Schools, 1975.

JESNESS BEHAVIOR CHECKLIST (1970)

AUTHOR

Carl F. Jesness
Department of Youth Authority
State of California
714 P Street, Room 800
Sacramento, CA 95814

PURPOSE AND USE

This checklist was designed to provide a systematic way of recording data about social behavior. It was originally developed for use with male delinquents in institutions, but has now been modified for use with persons of any age in a variety of settings. In producing a profile of 14 behavior ratings, it is "ideal for evaluating behavioral change in school or institutional settings and for comparisons between self and observer ratings for use in counseling or research."

DESCRIPTION

Development. Composite ratings were collected for 258 subjects aged 13-21 (average 17), incarcerated in 2 California institutions. However, the manual notes inadequate norms and cites efforts to obtain normative data from a variety of populations, including samples of nondelinquents, by requesting checklist users to submit their data.

Format. The checklist contains 80 items to be rated on a 5-point Likert-type scale from "almost never" to "very often." Fourteen bipolar factors are measured as follows:

Unobtrusiveness vs. Obtrusiveness (8 items)
Friendliness vs. Hostility (5 items)
Responsibility vs. Irresponsibility (9 items)
Considerateness vs. Inconsiderateness (7 items)
Independence vs. Dependence (5 items)
Rapport vs. Alienation (5 items)
Enthusiasm vs. Depression (5 items)
Sociability vs. Poor Peer Relations (4 items)
Conformity vs. Non-conformity (7 items)
Calmness vs. Anxiousness (6 items)
Effective Communication vs. Inarticulateness (5 items)
Insight vs. Unawareness and Indecisiveness (6 items)
Social Control vs. Attention Seeking (4 items)
Anger Control vs. Hypersensitivity (4 items)

The checklist is available either as a self-contained test booklet or as a booklet and machine-scorable answer sheet. Two discrete forms may be used: one filled out by the participant (a self-rating), and one by an observer(s) (same items as self-rating, worded in the third person "he").

Administration. A rater can usually complete the checklist in 10-20 minutes. An observer (i.e., not a self-rater) must have a good opportunity to observe and talk with the subject. The composite ratings of 2 or 3 observers are recommended. Non-professionally trained persons can use the checklist.

Scoring. The manual contains detailed instructions for hand-scoring, using a score key. Computer scoring is suggested as most convenient for obtaining percentiles and "T-scores" for both observer and self-appraisal scores. A computer profile also provides scores on Self-observer Distance, Self-observer Correlation, Self-observer Relative Position, Overall Observer Rating, and Overall Self-rating.

Availability. © 1970 by Consulting Psychologists Press, Inc.

Costs

Specimen set (no score keys)	$2.75
Manual	2.25
Score keys	4.00

	pkg. of 25	pkg. of 100	pkg. of 500
Observer Form	$ 4.25	$15.50	$72.00
Self-Appraisal Form	4.25	15.50	72.00
Profiles	1.75	6.50	30.00

Scoring Service (2 coupons required to score each checklist form)

sheet of 10 scoring coupons	$ 7.00
sheet of 20 scoring coupons	12.00
additional sheets of 20 on same order	10.00

RELIABILITY

Stability. Sixty-six delinquent males, aged 15-17, involved in an experimental treatment program in 2 California Youth Authority institutions were studied. Ratings were made approximately 30 days after the subject's arrival and again about 7 months later, just before their release from the institution. Observer scores were based on the average rating of 3 staff who observed the youths in different settings (school and living unit) and at different times of day. For the observer scores, stability coefficients for the 14 scales ranged from a low of .09 to a high of .51 with a median of .42. For the self-appraisal scores, stability coefficients ranged from a low of -.05 to a high of .58 with a median of .38. The manual cites unreliability of the instrument as a possible reason for the low correlations, although a significant amount of variation in scores may be due to behavior change in the subjects.

Inter-rater reliability. Forty-eight observers rated 122 institutionalized delinquents, aged 14-18. Uncorrected correlations range from .57 to .36. Using the Spearman-Brown formula, Jesness obtained corrected estimates based upon the average ratings of 3 observers. Correlations fall between .63 and .80.

VALIDITY

Most available data pertain to an earlier version of the checklist and do not apply to the current one. No validation is available for females or non-delinquent populations.

Construct validity. Jesness conducted a study in 1970 that showed scales scores to be related to parole outcomes as predicted.

Convergent and discriminant validity. Studies of 60 raters of 100 subjects and 80 raters of 100 subjects who rated themselves showed that ratings of the same trait by different raters correlate higher than ratings of different traits by the same rater.

OTHER TECHNICAL INFORMATION GIVEN

The manual presents intercorrelations among self-appraisal scores on the 14 scales and tables for converting factor scores to percentiles.

SOURCE

Consulting Psychologists Press
577 College Avenue
Palo Alto, CA 94306

REFERENCE

Jesness, C. F. Jesness Behavior Checklist manual. Palo Alto: Consulting Psychologists Press, 1971.

KROPP-VERNER ATTITUDE SCALE (1957)

AUTHORS

Russell P. Kropp
Florida State University
Tallahassee, FL 32306

Coolie Verner
Box 98
Mayne Island
B.C., Canada Von 2J0

PURPOSE AND USE

Russell Kropp and Coolie Verner developed this scale in 1957 for assessing attitudes toward any short-term educational activity for adults. The purpose of the scale is to measure overall reaction of a total group in attendance at an educational activity (e.g., meeting, conference, workshop, institute) and to allow for comparison of participant satisfaction with different types of activities.

DESCRIPTION

Development. This scale was developed to meet a perceived need for a general evaluative instrument capable of measuring elements common to any adult educational activity. It was designed to measure one common element in particular--the general attitude of participants at the end of an organized educational program. A group of 60 adults from summer school classes were asked to write a series of statements expressing the range of their own reactions to an educational meeting they had attended. After eliminating statements too specific to a single program, the authors completed 150 statements. Edited items were submitted to 70 judges who classified the items on an 11-point scale of favorableness. Items for the final scale were those which had the most interrater agreement and which represented different points on the 11-point scale.

Format. The scale is a checklist containing 20 statements pertaining to the quality of the meeting (e.g., "It was fair.") The respondents check those statements that most accurately describe their reactions to the total educational activity.

Administration. The scale is administered to groups of participants after completing the activity to be assessed. The time required is brief--10 to 15 minutes at most. Participants should be asked to read all 20 statements before checking any and to check only those statements that describe most accurately their reaction to the total activity.

Scoring. Simple hand-scoring directions yield a final score by 1 of 2 methods, which produce a mean or median score. Suggested administration and scoring directions are included with the instrument.

Availability. The scale appears in the 1957 Adult Education Journal cited on this page and can be used without author permission.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of this scale.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

RESULTS AND COMMENTS

This scale measures attitudes in general only. It is not suitable for evaluating content nor for diagnosing particular aspects of program design or management for which specific scales are needed.

SOURCE

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MATHEMATICS ANXIETY RATING SCALE (MARS) (1972)

AUTHOR

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PURPOSE AND USE

The MARS was designed as a screening diagnostic tool measuring mathematics anxiety, as a research scale where control group data are unavailable for comparative purposes, or as a means for construction of anxiety hierarchies for desensitization. During treatment, the MARS may be readministered to determine the client's progress in therapy. Although originally standardized on a university sample, the MARS may be used with "any clients suffering from mathematics anxiety" in desensitization therapy as a means of constructing anxiety hierarchies.

DESCRIPTION

Development. Suinn developed the MARS as an assessment tool for identifying mathematics anxiety. A normative sample of 397 students at the University of Missouri included volunteers who were informed of the purpose of the study, which was to develop norms for the MARS. Additional data were collected from volunteer students who responded to announcements of a behavior therapy treatment program for mathematics anxiety.

Format. The MARS is a 98-item self-rating scale. Subjects decide how much they are frightened by the situation posed in each item and check a box under the appropriate scale heading, ranging from "Not at all" to "Very much."

Administration. The MARS includes directions for the subjects, who are encouraged to work as rapidly as possible and to describe their anxieties as they currently exist. Group and individual administration are both possible. About 45 minutes should be sufficient for most subjects.

Scoring. The MARS "Information for Users" describes hand-scoring procedures. "With a simple adding machine, the test may be scored within about 5 minutes per form."

Cost. $27.00 for 100 copies.

Availability. © 1972 by Richard M. Suinn. All rights reserved. Published by RMBSI, Inc., P.O. Box 1066, Ft. Collins, Colorado 80522.

RELIABILITY

Internal consistency. Data from the normative sample (n = 397) provided a coefficient alpha of .97. Additionally, item-total correlations for more than half of the items were greater than .50.

Stability. Test-retest coefficients for the MARS were calculated for 2 samples. The first sample (35 students from the normative sample) was retested 7 weeks later, producing a Pearson product-moment correlation of .85. The second sample (119 students at Colorado State University) was retested after 2 weeks, producing a reliability coefficient of .78.

VALIDITY

Construct validity. In 3 studies (Richardson & Suinn, 1971; Suinn, Edie, Nicoletti, & Spinelli, 1970; Suinn & Richardson, 1971), scores on the MARS showed expected decreases after behavior therapy for mathematics anxiety. Before the therapy treatment, the subjects' mean score had been above that of the normal standardization sample (256.9 for 24 subjects in the therapy sample compared with 215.38 for the normative sample).

Brush (1977) administered the MARS to 2 groups of undergraduates at Weslayan University. The first group (n = 109) also completed a questionnaire on their background in mathematics. The second group (n = 80) also completed the Suinn Test Anxiety Behavior Scale (STABS). In both groups, Humanities majors showed higher mathematics anxiety than Social Science majors, who showed higher mathematics anxiety than Physical Science majors. The studies also showed an inverse relationship between high MARS scores and number of years of high school mathematics, number of terms of calculus, and grades achieved in high school mathematics. "Higher MARS scores were positively correlated with dislike of mathematics, a self-report of anxiety about the subject, the length of time such anxiety had persisted, and test anxiety as measured by the STABS.

Concurrent validity. Suinn, Edie, Nicoletti, and Spinelli administered the MARS and the mathematics section of the Differential Aptitude Test (DAT) with a 10-minute limit to the 119 subjects at Colorado State University. "Since the DAT items were presented with an overhead projector, only 44 of the original 119 subjects were included in order to rule out those subjects at the back of the room, who might not have been able to see the items clearly." Correlations between the MARS and the DAT ranged from -.32 to -.35, producing the expected negative correlations and indicating that "high anxiety as measured by the MARS is associated with low performance on DAT tasks."

SOURCE

Rocky Mountain Behavioral Science Institute
P.O. Box 1066
Fort Collins, CO 80521

REFERENCES

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MINNESOTA IMPORTANCE QUESTIONNAIRE (MIQ)
(1967, REVISED 1975)

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PURPOSE AND USE

The MIQ provides a measure of an individual's vocational needs. It was developed as part of the University of Minnesota's work adjustment project, whose conceptual framework is based on A Theory of Work Adjustment by Dawis, England, and Lofquist. Suggested counselor uses for the MIQ include the following: (1) assessing vocational needs of a client in the context of vocational planning; (2) preparing for the counseling relationship by examining the Security and Responsibility scores; (3) assessing changes in the client's vocational needs; and (4) helping a client plan effective and satisfying use of nonwork time. The MIQ permits comparison of the vocational needs of individuals with measured reinforcers in 148 occupations.

DESCRIPTION

Development. The MIQ was developed to measure vocational needs as required by the Theory of Work Adjustment. The first form of the MIQ, a modification of an N-Factor questionnaire, was a Likert-type scale. In 1965, a pair-comparison form, including 380 items, emerged as a significant improvement over the earlier version. Still another revision designed to improve scaling properties and reduce administration time came out in 1967. Data on this form were collected from 9 diverse populations including almost 5,000 people. A subsequent 1975 edition of the MIQ is now available.

Format. Two forms of the MIQ, a paired and a ranked form, are available. The paired form includes 210 items, which are divided into comparative pairs of vocational needs statements. The respondent marks which of 2 choices is "more important to me in my ideal job" for items 1-190, and marks "yes" or "no" for items 191-210 (statements about "on my ideal job it is important that. . . .")

The ranked form consists of 21 groups of 5 statements about "on my ideal job. . . ." The respondent ranks these sets of 5 statements from "1 = most important" to "5 = least important." The respondent also marks "yes" or "no" for 21 statements ("On my ideal job it is important that. . . ."); these include the last 20 items from the paired form.

Both forms measure 20 need dimensions important to job satisfaction:

Ability Utilization	Moral Values
Achievement	Recognition
Activity	Responsibility
Advancement	Security
Authority	Social Service
Company Policies & Practices	Social Status
Compensation	Supervision-Human Relations
Co-workers	Supervision-Technical
Creativity	Variety
Independence	Working Conditions

The MIQ test booklet is reusable; the answer sheets, consumable. Spanish and French language editions are available.

Administration. The MIQ is self-administering and can be used with groups or individuals. The paired form takes 30-40 minutes to complete, while the ranked form takes 15-25 minutes. A minimum 5th-grade reading level is suggested. The manual includes recommendations for the administrator (e.g., explain to the respondent what the phrase "ideal job" means).

Scoring. The MIQ is machine-scored by the University of Minnesota scoring service, which provides a 3-page report for each individual. Scoring includes computation of adjusted scale values for the 20 scales, a total circular triads score (indicating if the MIQ is invalid) and error bands. The profile is interpreted in terms of the needs of the individual. It provides information on the correspondence of the individual's need pattern to Occupational Reinforcer Patterns (ORPs); on 50 occupations with ORPs most similar and 50 occupations with ORPs most dissimilar; and for each occupation listed, (1) the correspondence index for that occupation, (2) a prediction of job satisfaction, (3) the occupation's cluster number in the Minnesota Occupational Classification System, and (4) references to additional information in the two volumes of Occupational Reinforcer Patterns.

The report also includes a validity score and an indication of the precision of the score for each need dimension. A separate manual describing use of the MIQ as a counseling tool--Counseling Use of the Minnesota Importance Questionnaire--is available.

Cost. The appropriate test form (paired or ranked) should be specified when ordering. Basic costs include the following:

	Per Copy	
MIQ booklets (minimum order--10)	$ .35	(10-99 copies)
	.32	(100-249 copies)
	.29	(250 or more)
Answer Sheets (minimum order--50)	.05	(50-499 sheets)
	.045	(500-999 sheets)
	.04	(1,000 or more)

Occupational Reinforcer Patterns	
2-volume set	$5.00
First volume	2.50
Second volume	2.50

The Counseling Use of the Minnesota Importance Questionnaire	$1.50
The Minnesota Occupational Classification System	3.25

Scoring Service:

Single copy of the report	1.10
Report plus 1 duplicate copy	1.25
Punched cards only	1.00
Report plus punched cards	1.20
Report, duplicate copy, and punched cards	1.35

Postage and handling are extra.

Availability. © 1975, University of Minnesota, Vocational Psychology Program. The MIQ is sold only to qualified users ("Level B" as defined by the American Psychological Association). Users should have some technical knowledge of test construction and use and also some knowledge of related fields such as statistics and guidance. Initial requests for copies of the MIQ should include a description of how it will be used and the professional qualifications of the persons who will use it.

RELIABILITY

Internal consistency. The reliability sample included 9 subject groups: 4 groups of college students, mostly sophomores (n=42, n=146, n=157, and n=283); 2 groups of high school students (n=73 and n=180); a group of night school students (n=27); a group of people from a "New Careers" program (n=53); and a group of college juniors and seniors (n=38). Hoyt reliability coefficients for each scale for the 9 groups, ranged from .77 to .81.

Stability. In addition to the sample described above, a group of 162 vocational-technical high school women was tested and retested at intervals ranging from immediately to 10 months. Median score stability coefficients ranged from .48 to .89. Profile stability was also demonstrated by the same test-retest; median stability coefficients ranged from .70 to .95. For the 10-month period, the coefficent was .87, showing that profiles are relatively stable over periods of about 1 year. Profiles are more stable than scale scores.

VALIDITY

Construct validity. Data from the MIQ support hypotheses from the Theory of Work Adjustment as described in detail in the manual. The test forms seem to be able to differentiate among groups. "Discriminant validity (is) reflected in the scale intercorrelations and the factor structure of the MIQ scales."

OTHER TECHNICAL INFORMATION GIVEN

Other information includes scale intercorrelations derived from data on 5,358 subjects; data on factor composition; and extensive references. A bibliography including references for 1972-1974 is available from the publisher.

RESULTS AND COMMENTS

The 1975 version says, "my boss would train the workers well. . . .", a revision of the earlier "my boss would train his men well. . . ." The manual has not been revised since 1971.

SOURCE

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REFERENCE

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Ohio Vocational Interest Survey (OVIS)
(1968, Revised 1969, 1970, 1972)

AUTHORS

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David W. Winefordner
John G. Odgers
Paul B. Koons, Jr.

PURPOSE AND USE

OVIS was developed to assist students in grades 8-12 with their educational and vocational plans. It can be used for group or individual exploration of the world of work in order to help students choose a high school program and make post-high school plans, to help potential dropouts make vocational plans consistent with their interests and abilities, to assist guidance counselors in planning occupational units for group guidance classes, to serve as a basis for building an occupational information file, to help administrators plan for curriculum expansion, and to identify groups of students interested in specific educational and vocational programs.

The OVIS was derived from the theoretical construct of the Cubistic Model, built on the assumption set forth in the Dictionary of Occupational Titles that data, people, and things are essential elements of any job.

DESCRIPTION

Development. To provide a cross-section of the jobs covering the world of work, OVIS was standardized in diverse geographical settings. The 10 states identified as representative of the 10 U.S. geographical regions were Alabama, California, Colorado, Iowa, Massachusetts, North Carolina, Ohio, Oregon, Pennsylvania, and Texas. In each state, school districts were drawn from the urban, suburban, and rural areas identified by census data as having employment patterns approximating those of their state. During February 1969, over 45,000 students in grades 8-12 in 43 school districts took part in the national standardization program.

Format. OVIS consists of 287 items: a 7-item Student Information Questionnaire and a 280-item Interest Inventory. Administrators have the option of adding 8 local questions. Students receive scale scores for 24 subscales: manual work, machine work; personal services; caring for people or animals, clerical work; inspecting and testing; crafts and precise operations; customer services; nursing and related technical services; skilled personal services; training; literary; numerical; appraisal; agriculture; applied technology; promotion and communication; management and supervision; artistic; sales representative; music; entertaining and performing arts; teaching, counseling, and social work; and medical.

There is a reusable student booklet and a machine-scorable answer form on which students fill in circles to mark their responses. For the Student Information Questionnaire, students respond to multiple-choice items. The 280 Interest Inventory items call for response to job activities on a 5-point Likert-type scale ("I would like this activity very much" to "I would dislike this activity very much").

Administration. OVIS is intended for group administration. The "Directions for Administering" presents detailed directions for administration. It recommends student orientation to interests and interest measurement to ensure that the OVIS results will be valid. OVIS is an untimed instrument, usually requiring 60-90 minutes. The "Directions" state that 1 sitting is preferred, but 2 are acceptable (except when the local survey section is used with 8th- and 9th-grade students, in which case 2 sittings may be more desirable).

Scoring. OVIS is machine-scored. The Data Services Division of the Psychological Corporation provides the only scoring service for the OVIS. Its basic service scores the answer sheet and provides 2 copies of a student report folder for the student and counselor. (The student report folder explains how to read a profile chart.) The 24 OVIS scale scores can be interpreted without reference to norms or by comparison with national norms, local norms, or both. Percentile rank and stanine norms are provided by grade and sex. Also reported is a scale clarity index for each scale. Available optional services include school and system summary reports, permanent record labels, list reports, IBM work cards, and computer tapes.

Costs

Item	Quantity	Price
Reusable booklet (for use with both MRC & NCS answer documents)	pkg./35	$12.75
MRC answer sheet	pkg./35	4.35
NCS answer folder	pkg./35	6.25
Specimen set	each	2.75
Extra Copies of Packaged Items		
Directions for Administering	each	.90
NCS Directions	each	.25
Accessories		
Manual for Interpreting	each	5.25
Guide to Career Exploration	each	7.25
Three-ring, loose-leaf binder for Guide	each	4.25
Career Exploration Leaflet	pkg./50	5.00

Scoring Services

Basic Services:	Student Report Folder with Norms		
	National Norms	Local Norms	National and Local Norms
MRC answer sheet	$ .80	$ .84	$ .87
NCS answer folder (weekly service)	.95	.99	1.02
NCS answer folder (daily service)	1.75	--	--

Optional Services:	Permanent Record Labels	List Reports	Summary Report	Punched Cards (2 per student)	Magnetic Tape Reel Charge* plus
MRC answer sheet	$ .07	$ .10	$ .10	$ .16	$ .06
NCS answer folder	.07	.10	.10	.16	.06

*$32.00 per reel

Availability. © 1969, 1970 by Harcourt Brace Jovanovich, Inc.; distributed by The Psychological Corporation.

RELIABILITY

Internal consistency. The reliability sample included every 5th male (8th grade n=983-1,014; 10th grade n=900-922) and every 5th female (8th grade n=962-986; 10th grade n=878-900) from grades 8 and 10 of the standardization population. Coefficients for the 24 OVIS scales ranged from .80 to .94.

Stability. A stability study involved 650 students (part of the standardization sample) who were tested in 8th grade and again in 10th and 12th grade. Median correlation coefficients were as follows:

	Grade 8 - 12		Grade 8 - 10		Grade 10 - 12	
	Median	Range	Median	Range	Median	Range
Females	.460	.35-.55	.555	.43-.68	.645	.49-.71
Males	.535	.43-.67	.565	.50-.65	.652	.51-.77

These data support previous findings that students' vocational interests become more stable as they approach the end of high school.

In addition, test-retest studies involved 1,251 8th-grade students from 5 Arkansas schools and 1,108 10th-grade students from 18 Wisconsin schools.

Reliability coefficients ranged from .72 to .90.

VALIDITY

Construct validity. The theoretical construct for the OVIS is the Cubistic Model based on the Dictionary of Occupational Titles (DOT) assumption that data, people, and things are essential elements of any job. Thus the DOT served as the validating source for item writing. The authors set forth that correlations for items with all 24 scales must show an item having higher correlations with its own scale than with any other scale and a correlation of higher than .60 with no more than 3 other scales. Item-scale correlation had to be at least .50 for the item to be acceptable. Additionally, the scale itself should not correlate above .70 with more than 3 other scales and the correlation between 2 scales should not exceed the reliability coefficient of either scale. (Intercorrelations of the 24 scales are based on a group of 570 male and 538 female 10th-grade students from the test-retest reliability study conducted at the time of the standardization.)

OTHER TECHNICAL INFORMATION GIVEN

The OVIS Manual for Interpreting presents a detailed discussion of validity and reliability. In addition, national norms, based on the standardization sample, are reported separately for each grade and sex. (Local norms can be developed based on grade and sex reference groups, which should contain a minimum of 100 students.) The Psychological Corporation produced a bibliography of 76 references to the OVIS.

In addition, 2 papers on how the OVIS avoids sex bias describe some aspects of interest inventories that have been traditionally sexist.

The current DOT is the 3rd edition and this edition still contains sex-referenced job titles. The sex-referenced terminology will be eliminated in the 4th edition which will be released later this year. OVIS was based on the 3rd edition and uses the job terminology of that edition. Every effort will be made to eliminate sex-referenced job titles in OVIS when the new titles and DOT codes become available.

SOURCE

The Psychological Corporation
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PERSONAL ATTRIBUTES QUESTIONNAIRE (PAQ) (1974)

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PURPOSE AND USE

The PAQ is a personality inventory that measures self-report of "masculine" instrumental and "feminine" expressive attributes. More specifically, the PAQ is designed to provide self ratings of subjects in terms of various attributes that have often been stereotyped as masculine or feminine. The PAQ has been used primarily with college students and adults for research purposes.

DESCRIPTION

Development. The PAQ was derived from the item pool of the Sex Role Stereotype Questionnaire (SRSQ) developed by Rosenkrantz, Vogel, Bee, Broverman, and Broverman (1968)[1]. For 66 items of the SRSQ, significant sex-role stereotypes were found for both male and female subjects in their judgments of typical college students and adults. Fifty-five of these items were chosen arbitrarily for the PAQ. The PAQ was initially given to 248 male and 282 female introductory psychology students at the University of Texas, Austin, in the fall of 1973.

Format. Two forms of the PAQ are available: the regular 55-item scale and the shortened 24-item scale. Items in both scales are distributed among 3 scales: Masculinity (M), Femininity (F), and Masculinity-Femininity (M-F). The M and F scales consist of descriptors that are considered socially desirable for both sexes but that are perceived as stereotypically more characteristic of males and females respectively. The M-F scale includes items for which social desirability judgments for the two sexes differ. Items are set up on a 5-point bipolar scale, the extremes having verbal labels, e.g., "not at all independent" and "very independent."

Scores on each scale are obtained by summing the item scores. A "median split" method has been developed for combining scores on the several scales. Each individual is classified as falling above or below the median of a normative group on the M and F scales, a 2 x 2 scheme that results in 4 groups: Androgynous (individuals above the median on both M and F),

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[1] Rosenkrantz, P. S., Vogel, S. R., Bee, H., Broverman, I. K., & Broverman, D. M. Sex-role stereotypes and self-concepts in college students. Journal of Consulting and Clinical Psychology, 1968, 32, 287-295.

Masculine (above the median on M and below on F), Feminine (above the median on F and below on M), and Undifferentiated (below the median on F and M). An 8-way classification may be obtained by classifying each member of the 4 groups as above or below the median on the third, M-F, scale.

Subjects first are asked to rate themselves on each bipolar item. Then, they are given 1 pole of each item and asked to compare directly the typical male or female on a 5-point scale ranging from "much more characteristic of the male" to "much more characteristic of the female."

Administration. The questionnaire is self-administering and could be used with groups or individuals. The long form would probably require about 30-45 minutes to complete, the short form about half that time.

Scoring. The questionnaire can be hand- or machine-scored. Hand scoring is described in the JSAS document.

Cost. JSAS Manuscript No. 617, describing the PAQ, may be purchased for $2.00.

Availability. The PAQ is "copyrighted" only inasmuch as it has been published by the APA. Users must contact the authors for permission to use the instrument and inform the authors of their results. The authors grant permission only to "individuals with appropriate professional credentials who are bound by the APA code of ethics or its equivalent or to students working under the supervision of such individuals."

RELIABILITY

Internal consistency. Alpha coefficients for the Self scales were .73 and .91. Cronbach alpha coefficients for the short form were .85, .82, and .78 for the 8-item M, F, and M-F scales, respectively.

Interscale reliability. In a study of college students, correlations betwen the long and short forms were .93, .93, and .91 for the M, F, and M-F scales, respectively.

Stability. Thirty-one subjects took the PAQ for a second time, after an interval of about 13 weeks. Except for 1 male who seemed to respond randomly, the r's on the Stereotype scale were .92 and .98 for men and women, respectively, and .80 and .91 on the Self scale. Values for the subscales varied from .65 to .91.

VALIDITY

Construct validity. Research to date (Spence and Helmreich, 1978) has shown expected differences in distributions of PAQ scores in samples from different populations. For example, sex traditional distributions (high M and low F for males, the reverse for females) is most frequent, and the cross-sex distribution least frequent. Differences in distributions beteen male and female homosexuals, between homosexuals and unselected same-sex groups, and between female varsity athletes and unselected same-sex groups have also been shown.

Concurrent validity. According to the authors, establishing the PAQ's concurrent validity would be difficult and perhaps inappropriate because conceptually the PAQ measures internal characteristics that influence overt behavior but are not necessarily consistent with behavior.

OTHER TECHNICAL INFORMATION GIVEN

The JSAS document presents the following information: number and percentage of items for which significant differences occurred between mean ratings of typical adults, students, and self-ratings; results of 6 tests for individual items; mean self and stereotype ratings by sex for 55 PAQ items; selected percentiles and other statistics for men and women on each scale; correlations between PAQ scales for 2 different samples and between the PAQ and social desirability; and a distribution of scores on the M-F Self-scale.

A book by Spence and Helmreich will be published in 1978 and will provide more information on research on the PAQ.

SOURCE

Journal Supplement Abstract Service
American Psychological Association
1200 - 17th Street, N.W.
Washington, D.C. 20036

(Manuscript No. 617)

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PIERS-HARRIS CHILDREN'S SELF CONCEPT SCALE ("THE WAY I FEEL ABOUT MYSELF") 1969

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PURPOSE AND USE

The purpose of this scale is to provide information on children's self attitudes and correlates of those attitudes. It was designed primarily for research. "Any use other than for research should be entered into cautiously, and subject to the limitations described in this manual." These limitations include the following: It is strongly recommended that the scale not be used for comparisons between children, or other individual use, unless great care is paid to the standard error of measurement, and in the case of retesting, to the typically-found higher score on retest. In case of group retesting after some experimental program, a control group is essential. In a group setting, children with at least a 3rd-grade reading level can complete the scale. It may be used on an individual basis with children below that reading level and younger children.

DESCRIPTION

Development. A preliminary pool of 164 items was pilot tested on a sample of 90 children from 3rd-, 4th-, and 6th-grade classes in a small school district. A 140-item scale was subsequently given to a sample of 4 3rd-grade classes (n = 119), 4 6th-grade classes (n = 127), and 4 10th-grade classes (n = 117) in a large Pennsylvania school system. The elementary school population represented a cross-section of socioeconomic levels in the community. In the high school, students from slow, average, and bright classes participated. Responses from the 6th-grade sample of 127 students were used for item analysis.

Normative data were provided by a sample of students in grades 4-12 in a small Pennsylvania town public school district (n = 1,183: grade 4, n = 275; grade 6, n = 265; grade 8, n = 231; grade 10, n = 221; grade 12, n = 219). The manual presents means and standard deviations for that sample and also for a variety of other samples.

Piers prepared a monograph in 1977, citing the use of the scale in hundreds of school systems and clinics, as a major research instrument in theses and dissertations, and in ongoing research programs. The monograph contains extensive information on reliability and validity (supplementing that in the manual) and discusses foreign language versions of the scale (including Hindi, (Mexican) Spanish, Mikasuki, British, and Philippine). It contains 67 references for the scale.

Format. This scale is an 80-item yes-no self report in booklet form. Cluster scores are available for 7 factors--behavior, intellectual and school status, physical appearance and attributes, anxiety, popularity, happiness, and satisfaction--although information from them is only tentative at this time. Subjects circle a "yes" or "no" response to each item.

Administration. About 15-20 minutes are usually required to take the scale. The manual includes detailed instructions for the administrator.

Scoring. The administrator may use a scoring key overlay to count the number of circled items and to obtain cluster scores. Computer scoring is also available from the publisher. For each respondent, it provides a total positive score and cluster scores as well as the group means and standard deviations for all scores. Although the manual includes norms, it recommends that test users develop their own local norms because of the limited norming population.

Costs

Test booklets	1-99 copies	23¢ each
	100 or more	20¢ each
Test Manuals		$1.00 each
Specimen Sets		1.50 each
Scoring Keys		.60 each
Computer Scoring:	10- 99 tests	40¢ per test
	100-999 tests	36¢ per test
	1,000 and over	30¢ per test

Availability. © 1969, Ellen V. Piers and Dale B. Harris.

RELIABILITY

Internal consistency. The manual states that most of the reliability data come from the original standardization sample, which used the 95-item scale. Piers and Harris collected the data in 1964. To measure internal consistency, they used the Kuder-Richardson Formula 21, which produced coefficients ranging from .78 to .93. As a check they applied the Spearman-Brown odd-even formula (for half the grades 6 and 10 samples) with resulting coefficients of .90 and .87. Piers (1977) presents summary data on studies that confirm a general alpha coefficient of about .90 for the scale. She also notes a study that obtained a split-half reliability of .91 with American Indian children.

Stability. Piers and Harris retested 56 3rd graders, 66 6th graders, and 60 10th graders after 4 months, and obtained reliability coefficients of .72, .71, and .72 respectively. The manual cites Wing (1966), who used the revised 80-item scale with an Oregon sample of 244 5th graders. Both a 2-month and 4-month test-retest showed coefficients of .77.

Additional data in Piers (1977) confirm correlations of over .70 for test-retest over a 5 month period and show correlations of .80 or over for shorter periods (3-4 weeks).

VALIDITY

Content validity. The manual states that the authors attempted at the outset to build in content validity by defining the universe to be measured as the areas about which children reported qualities they liked or disliked about themselves (Jersild, 1952)[1]. Items were written to cover all areas. Although some items were dropped, the scale still covers all factors to varying degrees.

Construct validity. During standardization, the scale was administered to 88 adolescent institutionalized retarded females whose mean age was 16.8 years and mean I.Q. was 70. This was done to confirm predictions that certain groups would have significantly different self-concept scores. This group did score significantly lower than normals of the same chronological age or normals of the same mental age; however, another study supports the theory that the lower scores are more likely caused by institutionalization than by retardation.

Concurrent validity. Mayer's (1965)[2] comparison scores on the Piers-Harris with scores on Lipsitt's Children's Self-Concept Scale produced a correlation of .68 on a sample of 98 special education students. Cox' (1966)[3] comparison with big problems on the SRA Junior Inventory produced a correlation of -.64, and with health problems -.48 on a sample of 97 children in grades 6-9. Typical correlations of self-report with peer and teacher ratings ranged from non-significant to .49 in 2 studies involving 111 4th graders and 113 6th graders, and 97 students in grades 6-9, respectively.

Piers (1977) presents data on correlations of the scale with over a dozen other measures.

---

[1] Jersild, A. T. In search of self. New York: Teacher's College, Columbia University, Bureau of Publications, 1952.

[2] Mayer, C. L. A study of the relationship of early special class placement and the self-concepts of mentally handicapped children. Unpublished D.Ed. dissertation, Syracuse University, 1965.

[3] Cox, S. H. Family background effects on personality development and social acceptance. Unpublished doctoral dissertation, Texas Christian University, 1966. Summarized in: Peer acceptance-rejection and personality development, Project No. OE 5-0417, Contract No. OE 2-10-051, U.S. Department of Health, Education, and Welfare.

OTHER TECHNICAL INFORMATION GIVEN

The manual reports that no consistent sex differences have been demonstrated on the Piers-Harris Scale and that, similarly, no consistent differences between grade levels can be expected (with the emphasis on consistent). There is considerably more consistent evidence that variability of scores tends to decrease as grade level increases. Additional issues discussed are the development and correlates of self-concept, and problems of self-report inventories such as item ambiguity, response constraints, faking, and social desirability.

Piers (1977) reports on studies in which the scale was used with black, hispanic, and American Indian children and with special educational groups.

SOURCE

Counselor Recordings and Tests
Box 6184
Acklen Station
Nashville, TN 37212

REFERENCES

Piers, E. V. Manual for the Piers-Harris Children's Self Concept Scale. Nashville: Counselor Recordings and Tests, 1969.

Piers, E. V. The Piers-Harris Children's Self Concept Scale, Research Monograph #1. Nashville: Counselor Recordings and Tests, 1977.

PLANNING CAREER GOALS (PCG) (1975)

AUTHORS

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PURPOSE AND USE

The PCG is a battery of tests designed to assist guidance and counseling personnel in helping students in grades 8-12 make realistic and long-lasting educational and career goals.

The PCG combines measures of abilities, interests, occupational information, and a life and career plan into a single "Career Planning Information System," and allows individuals to compare their own scores with those of thousands of people in a variety of careers. The PCG is useful in a variety of ways for individual counseling, group guidance, and career education programs.

DESCRIPTION

Development. The PCG is based on the extensive longitudinal data of Project TALENT, a national survey of about 400,000 high school students tested first in 1960. The need for the PCG was based on findings of Project TALENT, indicating that students need help in making realistic career choices. More recent surveys have indicated further that general life style and quality of life choices are increasingly important in career decisions. Hence, the general approach of the PCG was to survey quality of life values and relate these to interests, abilities, and information. Developmentally, the PCG tests were designed to parallel the most discriminating TALENT tests. Experimental forms of the test were tried out in 1974; the results provided data for a comprehensive item analysis, which was used in the selection of the final battery.

Format. The PCG includes 3 lengthy multiple-choice test booklets, plus a brief life- and career-planning questionnaire, printed on the answer sheet. The number of items and time limits for each subpart are shown below:

Test	No. of Items	Working Time (in minutes)	Accumulated Time (in minutes)
Life and Career Plans	19	10	10
Ability Measure (10 subparts)	366	158	168
Interest Inventory (3 subparts)	300	30-45	198-213
Information Measures	240	80	278-293

Administration. The PCG is designed primarily for group testing. Detailed administration instructions are given in the manual. Included are suggested schedules ranging from 2 to 6 testing sessions, since total testing time is almost 5 hours.

Scoring. The PCG can be machine- or hand-scored. CTB/McGraw-Hill's CompuScan scoring service may be used. Answer keys, acetate scoring stencils, and complete directions are available for hand-scoring.

Cost. A specimen kit is available for $5.00. The PCG Career Handbook containing job descriptions, education and training requirements, expected salaries, interests, abilities, job satisfaction, future opportunities and profiles for interests and abilities for each of 151 occupations is available for $7.95. A detailed price list is available from CTB/McGraw-Hill. Principal prices follow:

Complete Test Battery (including Manual and Key)	$48.75/package of 25
Answer Sheets	25.00/package of 50
Scoring Stencils (10 comprise the battery)	25.00/all 10
Scoring Service (complete battery)	1.00/student

Availability. © 1975, McGraw-Hill, Inc.

RELIABILITY

Internal consistency. Split-half reliability coefficients were calculated for all PCG measures, using a priori splits, and correcting the correlation by means of Angoff Formula 16. These are reported in the Technical Bulletin No. 1, and can be summarized as follows:

Range of Reliability Coefficients over 12 Career Groups or Subtests

	Grades			
Test	8	9	10	11
Interest	.86-.97	.85-.97	.84-1.00	.84-.98
Information	.63-.87	.67-.89	.70- .86	.67-.87
Ability	.69-.94	.70-.94	.71- .93	.68-.91

VALIDITY

Predictive validity. Although the Technical Bulletin presents no predictive validity statistics, it states that "The measures. . .have been shown to have predictive validity. . .by analyzing the data from the 5- and 11-year Project TALENT follow-up studies. . .the validities. . .are based on the predictive data of persons now in various career groups, obtained when they were high school students."

Construct validity. To determine whether each PCG measure makes a unique contribution of information, the amount of unique variance in each measure was calculated. Sample statistics of this analysis for the 10th grade sample appear in the Technical Bulletin, which states that, "The results indicate that each of the measures is capable of making a unique contribution to the self-descriptions and the discriminations among the available choices of careers."

OTHER TECHNICAL INFORMATION GIVEN

The Technical Bulletin provides additional data, including summary data from all PCG measures, comparisons of 1960 and 1975 TALENT test data, PCG raw score to percentile or stanine tables, weighed combined scores to predict success in occupational means for quality of life items, and detailed information for hand scoring.

SOURCE

CTB/McGraw-Hill
Del Monte Research Park
Monterey, CA 93940

REFERENCES

American Institutes for Research. Planning Career Goals examiner's manual. Monterey, Ca.: CTB/McGraw-Hill, 1975, 1976.

American Institutes for Research. Planning Career Goals price list. Monterey, Ca.: CTB/McGraw-Hill, 1977.

American Institutes for Research. Planning Career Goals technical bulletin No. 1. Monterey, Ca.: CTB/McGraw-Hill, 1977.

Questionnaire on Parent and Educator Knowledge Of and Attitudes Toward Sexism and The Law (1977)

AUTHORS

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PURPOSE AND USE

A WEEA project (Project ASPIRE) developed this instrument to investigate parent and educator knowledge of and attitudes toward sexism and the law as it now stands. It may be used as a pre- and post-test of a training program to increase teacher, counselor, administrator, and parent awareness of sexism. Project ASPIRE includes 4 modules, of which the first 3 correspond to parts of the questionnaire:

- self-awareness of sexism
- sexism in schools
- evaluating counseling and curriculum materials
- developing process of change for a local school system

DESCRIPTION

Development. The authors wrote 130 items based on the objectives of Project ASPIRE. After a field test of all items, the authors identified for the final instrument those items with the best discrimination capabilities. The field testing occurred in December 1976 and January 1977. Representative samples of about 50 administrators, parents, teachers, and counselors (who were not the target group taking the modules) served as the population for the field test. The authors selected items that measure achievement of the objectives for all 4 modules.

Format. The questionnaire contains 61 items in 6 categories. Items 1-32 pertain to knowledge, items 33-61 pertain to attitude. The following list shows the number and type of items in each category.

Category	Number of Items	Response Type
Factual question on sexism	14	yes/no/not sure
Women who have contributed to women's equity	6	multiple choice
Title IX	8	yes/no/not sure
Content analysis of sex bias in materials	4	yes/no

Category	Number of Items	Response Type
Adjectives characterizing males, females or either	6	multiple choice male/female/either
Attitudes toward sex roles	23	5-point scale (strongly agree to strongly disagree)

Respondents mark their answers on a separate answer sheet, which can be read by an optical scanning computer.

Administration. The authors administered the questionnaire to groups, but individual administration is possible. Suggestions for administration are included with the instrument.

Scoring. Computer scoring has been designed for the questionnaire. Powell can provide information on scoring.

Cost. Unknown.

Availability. Although the questionnaire is not copyrighted, potential users should contact the authors for permission to use it.

RELIABILITY

Powell is currently conducting analyses of posttest data collected in June. Initial Pearson correlations are appended to this description.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

In addition, Powell's analyses should provide validation data.

RESULTS AND COMMENTS

Because this questionnaire was developed to test particular modules, some of the items require knowing specific content. Questionnaire administrators may want to obtain copies of the modules in addition to the questionnaire.

SOURCE

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Livonia, MI 48154

REFERENCES

Mullally, B. Personal communication, April 1977.

Powell, C. Personal communication, April 1977.

SELF-ESTEEM QUESTIONNAIRE (FORM SEQ-3) (1971)

AUTHOR

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PURPOSE AND USE

The SEQ-3 provides information on 2 variables of a person's self-report in the area of self-esteem, including self-esteem (SE)--an individual's feelings of worth, success, and competence--and self-other satisfaction (SOS)--an individual's level of satisfaction with regard to those feelings. The measure is designed for use with a wide variety of age levels (elementary school to adult) and is intended for use in individual counseling as well as program evaluation. The SEQ-3 is one of several measures developed at TADC, whose goal is to help individuals and organizations achieve their own goals in an effective and efficient fashion. Another of TADC's measures, the Work Atmosphere Questionnaire, is described in this monograph.

DESCRIPTION

Development. The first step in developing the measure was to define "self-esteem" as precisely as possible. Relevant items were then drafted and submitted to samples of respondents (4th grade students to adults) for review. Respondents were told what the measure was intended for and asked to suggest additional items and revisions for the proposed items. Subsequently, items were subjected to the cluster analytic procedures developed by Robert C. Tryon and Daniel E. Bailey. To be included in the final measure, all items had to have oblique factor coefficients of at least .50.

Format. The SEQ-3 consists of 21 Likert-type items. The respondent marks each statement pertaining to self-perception on a 5-point scale of agreement ranging from "Not At All" to "Yes, Very Much." The questionnaire is printed on a form that can be read by an optical scanning machine.

Administration. The questionnaire can be administered to groups or individuals. Depending on age of respondent, the time required would probably be about 15 minutes. Respondents are asked not to respond to any statement they do not understand. Administration directions are given with the questionnaire and in the manual.

Scoring. A special computerized scoring process called Convergence Analysis is used to score the SEQ-3. This process is designed to scan a person's responses to determine whether they meet a minimum validity requirement of response consistency. The SEQ-3 may be scored by TADC. Computer programs for scoring are available as well. Additional scoring information is given in the manual.

Costs. The prices given below were effective July 1, 1976 and are subject to change without notice.

Quantities	Scoring (Including Answer Sheet)	Answer Sheet Only
1 - 1,000	.75 per copy	.20 per copy
1,001 - 2,500	.65 " "	.15 " "
2,501 - 5,000	.55 " "	.12 " "
5,001 - or more	.45 " "	.10 " "

Minimum scoring charge	$50.00
Cost to build name file for preprinting	.15/person
Cost to preprint ID information	.10/document
Minimum handling charge	5.00

Availability. © 1971, by James K. Hoffmeister. The computer programs for scoring may be obtained from TADC. Ask for the Test Analysis and Reporting Package.

RELIABILITY

Internal consistency. On a final set of 21 questions administered to about 300 students in grades 4-6, 260 students in junior high school, 100 high school students, and 800 Air Force cadets and other adults, the developers obtained Cronbach alpha coefficients ranging from .80 to .95 on SE and .85 to .96 on SOS.

Stability. The developers tested about 250 students in 4th-6th grade in a suburban Denver school on 2 occasions about 2 weeks apart. The Pearson correlations were about .70 for both SE and SOS.

VALIDITY

Content validity. Evidence of content validity derives from the item review and cluster analysis process to which the measure was subjected during its development.

Concurrent validity. About 225 students in 5th grade in elementary school took both the SEQ-3 and the short form of Coopersmith's measure of self-esteem. The correlation between the 2 measures was .61. The correlations between SOS and Coopersmith's total score was .40.

Efforts to correlate the SEQ-3 with other criterion measures have yielded the following: no relationships with IQ as measured by the Lorge-Thorndike or Otis-Lennon; low correlation with achievement as measured by the ITBS, SAT, MAT, or teacher grades; and only a moderate relationship to parent or staff ratings of students self-esteem (r = C.30).

OTHER TECHNICAL INFORMATION GIVEN

Typical scores for various samples are given in the manual. Descriptive information is provided for several other related questionnaires measuring classroom, school, and work atmosphere.

RESULTS AND COMMENTS

Technical data on the SEQ-3 and related measures appears to be limited despite the age of the tests (6 years) and the large samples involved (over 10,000 subjects).

The developer would like to receive results from persons who use the Self-Esteem Questionnaire.

SOURCE

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Test Analysis and Development Corp. (TADC)
855 Inca Parkway
Boulder, CO 80303

REFERENCES

Hoffmeister, J. Personal communication, March 10, 1977.

Hoffmeister, J. Personal communication, March 23, 1977.

Test Analysis and Development Corporation. General information on tests and services. Boulder, CO.: Author, 1976.

Sex Attitude Measure (SAM) And Sex Stereotype Measure II (SSM) (1976)

AUTHORS

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PURPOSE AND USE

These instruments were developed to gain understanding into the nature of sex-trait stereotypes and of the impact of these belief systems upon child development and adult adjustment. More specifically, the SSM II was developed to assess children's knowledge of adult-defined, conventional sex-trait stereotypes. The SAM was developed to assess children's attitudes or evaluative bias toward male or female persons, independent of their stereotype knowledge. They were designed with several purposes in mind: to study the development of conventional sex stereotypes among elementary children, to determine which traits are learned earlier and which later, to study the development of evaluative bias toward the two sexes, and to study the relationship between sex-stereotype knowledge and evaluative sex bias.

DESCRIPTION

Development. The content of the measures was derived from earlier attitude measures. The SSM II was a revision of a shorter SSM which included 24 adjectives chosen from the Adjective Check List (Gough & Heilbrun, 1965) as those which college students identified as descriptive of one sex over the other. The SAM adjectives were derived from the evaluation dimension of the semantic differential and have been effective in measuring children's attitudes. They were also used in the Preschool Racial Attitude Measure II (PRAM II) and the Color Meaning Test II (CMT II).

The standardization group for both measures consists of the following: 196 Euro-American children from Winston-Salem, N.C.: 30 girls and 30 boys, preschool children with a mean age of 4 years 11 months; 44 girls and 44 boys in grade 3; and 24 girls and 24 boys in grade 6. The children were tested in the spring of 1975 and 1976.

Format. Both the SSM II and SAM use short stories and male and female silhouettes as stimulus materials. Thirty-two SSM II picture stories are designed to represent traits that adults define as descriptive of male and female stereotypes. Children are asked to select the male or female figure as most likely to have the trait described. For example: "One of these people talks a lot. . . Which person talks a lot?"

The SAM uses the same stimulus materials (human figures) as the SSM II. Twenty-four stories using positive and negative evaluative adjectives are presented to children such as "Here are two people. One of them is a naughty person. . . Which one is the naughty person?"

Administration. Both measures are designed for individual administration for very young children (preschool - grade 3) and group administration to older ones. The SSM II and SAM take about 20 and 15 minutes, respectively, when prescribed individually, and slightly longer with groups. It is suggested that both male and female examiners be used, preferably equally. The examiner should be "good" with children and very familiar with the procedures ahead of time.

Scoring. The SSM II and SAM are hand-scored using scoring keys and record sheets provided with the instruments.

Cost. A stimulus materials packet for the SSM II and SAM individual and group procedures is available for $5.50 and includes the following: 32 silhouettes for the individual procedure, a copy of the SSM II and SAM stories, instructions, a record sheet for each measure, and a copy of the group procedures and scoring keys. Extra copies of the group procedure are available for $.20 each.

Availability. Requests for materials should be sent to: Sex Stereotype Research Project, Department of Psychology, Box 7778, Wake Forest University, Winston-Salem, NC 27109 (919/761-5424).

VALIDITY

Content validity. A panel of expert judges developed the items for the original SAM and the SSM II. To assess the success of these judges in composing appropriate stories, 110 male and female college students were asked to judge each item as being typically male or female. Thirty-one of the 32 stories were judged in the expected manner 80% of the time. The 1 exception was replaced with a more suitable item.

Construct validity. Results of the SSM II and SAM have both supported and contradicted various hypotheses relating to the development of sex stereotype knowledge and attitudinal bias. The authors cite the need for further research into these questions.

OTHER TECHNICAL INFORMATION GIVEN

The references cited below present mean SSM II scores for 3 age groups, results of a 4-dimensional analysis of variance of male and female stereotype subscores, the percent of male, female, and both groups giving stereotyped responses to each SSM II item, and product-moment correlations for total SSM II and SAM scores.

SOURCE

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Wake Forest University
Winston-Salem, NC 27109

REFERENCES

Best, D. L., Williams, J. E., Cloud, J. M., Davis, S. W., & Robertson, L. S. Development of sex-trait stereotypes in young children. Winston-Salem, NC: Wake Forest University, 1976.

Best, D. L., Williams, J. E., Cloud, J. M., Davis, S. W., Robertson, L. S., Edwards, J. R., Giles, H., & Fowles, J. Development of sex-trait stereotypes among young children in the United States, England, and Ireland. Child Development, 1977, in press.

Williams, J. E., Best, D. L., & Associates. Sex stereotypes measure II and Sex attitude measure--General information and manual of directions.

Williams, J. E., Best, D. L., & Davis, S. W. Sex stereotype measure II (SSM II) technical report. Winston-Salem, NC: Wake Forest University, 1977.

Sex Role Ideology and Family Orientation Scale (SRIFOS) (1976)

AUTHORS

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PURPOSE AND USE

The purpose of this scale is to determine high school students' attitudes toward sex roles and toward the family as an institution. The scale can be used to evaluate aspects of the success of a program designed to reduce traditional stereotypical attitudes.

DESCRIPTION

Development. The Scale emerged in conjunction with the development, tryout, and evaluation of 4 innovative minicourses on the topic of family life. The course authors were interested in examining sex differences in sex role conceptions and family orientation and their relationship to selected demographic characteristics. Previous studies had related traditional sexist values to demographic characteristics such as maleness, low SES and non-college orientation. The authors wanted to study similar relationships. The SRIFOS was designed to collect the relevant attitudinal data. Demographic data were also gathered. Data were collected in the spring of 1975 from 529 students in grades 9-12, attending 4 high schools representing 4 distinct socioeconomic groups.

Format. The scale consists of 37 Likert-type items to be rated on a 5-point scale ranging from "strongly agree" to "strongly disagree." Nine items relate to a component labeled "Sex Role Ideology," and another 5 items tap attitudes toward the family as an institution.

Administration. The scale is self-administering and can be given to individuals or groups. (It was designed primarily for research purposes and therefore was intended for group scores.) Further development, administration, and scoring descriptions are available in two papers as follows:

(1) Angrist, Shirley S., Mickelsen, Richard, and Penna, Anthony N. "Sex differences in sex role conceptions and family orientation of high school students," Carnegie-Mellon University, October 1976.
(2) Angrist, Shirley S., Mickelsen, Richard, Penna, Anthony N. "Development and evaluation of family life courses," Carnegie-Mellon University, August, 1976.

The second paper was published in Theory and Research in Social Education, Vol. 4, No. 2, December 1976, pp. 57-79.

Scoring. Although no specific information is given in the articles, the scale can be hand- or machine-scored.

Cost. Mailing and handling charges only.

Availability. Although the SRIFOS is not copyrighted, users should contact the authors for permission.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of this scale.

VALIDITY

Content validity. An examination of the items reveals at face value their relation to their intended content of sex roles and family. More specifically, some of the sex role items were drawn from an earlier work by Hoffman (1963).[1] Factor analysis of these items yielded 9 items that loaded at least .40 on the principal component subsequently named "Sex Role Ideology." These 9 items are used additively in scoring the scale on the sex role dimension.

Construct validity. Results of the study substantiated some basic theoretical and research-based expectations. Scores on the Sex Role Ideology scale showed generally that males are more sexist than females, blacks more than whites. Also more sexist are persons with fathers having a high school education or less or mothers who are full-time homemakers, and persons who are relatively weaker academically. Males from the school with the highest academic and SES rating were less sexist than other males. Females from the inner city and aspiring lower middle class schools tended to be more sexist as did females with less educated fathers and homemaker mothers. Contrary to expectations, however, only 1 of 5 family orientation items is significantly correlated (.25, $p < .001$) to sex role attitudes for men although these items seem to influence women's sex role conceptions more. The reason for this discrepancy may be that the scale is overly biased toward female-gender-tied responsibilities.

OTHER TECHNICAL INFORMATION

An article describing the instrument presents mean scores on sex role ideology for selected demographic variables, factor loadings of the sex role ideology items, partial correlations between sex role ideology scores and the 5 family orientation items, and regression results for females and males on sex role ideology.

RESULTS AND COMMENTS

The use of the scale has been very limited thus far. Replication has not been done nor have internal reliability measures been taken.

---

[1] Hoffman, Lois W. Parental power relations and the division of household tasks. In F. I. Nye and L. W. Hoffman (Eds.), The employed mother in America. Chicago: Rand-McNally, 1963, pp. 215-230.

SOURCE

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REFERENCES

Angrist, S. S., Mickelsen, R., & Renna, A. N. Development and evaluation of family life courses. Theory and Research in Social Education, 1976, 4, 57-79.

Angrist, S. S., Mickelsen, R., & Renna, A. N. Sex differences in sex-role conceptions and family orientation of high school students. Journal of Youth and Adolescence, 1977, 6, 179-186.

Sex-Role Survey (SRS) (1976)

AUTHOR

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Center for the Study of Human Sexuality
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PURPOSE AND USE

The SRS is designed to determine the extent to which respondents have a positive attitude toward equality between the sexes on the following dimensions: equality in business and the professions, sex-appropriate behavior (masculinity/femininity), social-domestic work, and power in the home.

DESCRIPTION

Development. Starting with 169 items (some from Kirkpatrick's [1936][1] Belief Pattern Scale, others developed by MacDonald), the author tested various forms of the scale. One hundred West Virginia University (WVU) students took a 169-item version of the scale and 133 WVU students took a 140-item version. MacDonald performed factor analysis and item analysis on each set of data, and prepared a 63-item form, which was administered to 639 very diverse subjects (ages 14-73). He then factor analyzed responses to the 63-item form (1974). The final form was subsequently developed.

Format. The SRS consists of 53 items, to be rated from "agree very much" to "disagree very much" on a scale of +3 to -3. Respondents circle numbers that match their opinions. The survey includes 4 subscales:

Factor I.	Equality in business and professions (EQBP)
Factor II.	Sex-role appropriate behavior/masculinity-femininity (S-RAB/MF)
Factor III.	Equality in social and domestic work (S-DWK), and
Factor IV.	Power in the home (POWHO).

A 20-item short form is also available.

Administration. The SRS is designed primarily for group administration. A test manual is currently in preparation.

Scoring. The SRS can be hand- or machine-scored.

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[1]Kirkpatrick, C. The construction of a belief pattern scale for measuring attitudes toward feminism. Journal of Social Psychology, 1937, 7, 421-437.

Costs

Single copies	$1.25
Orders of less than 10	.80 per copy
Orders of 10 or more	.75 per copy
Scoring service available	.15 per test

Availability. © 1976 by A.P. MacDonald, Jr., Ph.D.

RELIABILITY

Internal consistency. The SRS was given, along with 7 other tests, to 193 sociology students at WSU in late 1973. High alpha coefficients are reported for the long form of the survey:

Subscale	Sample	Males	Females
EQBP	.941	.825	.890
S-RAM/MF	.849	.825	.869
S-DWK	.850	.854	.832
POWHO	.855	.879	.807
Total SRS	.962	.961	.944

For the short form, alpha coefficients from a study of 101 college students follow:

EQBP	.602
S-RAB/MF	.834
S-DWK	.700
POWHO	.855
Total SRS	.887

Stability. Test-retest reliabilities from a survey of 44 subjects taking the short form are as follows:

EQBP	.663
S-RAB/MF	.885
S-DWK	.798
POWHO	.665
Total SRS	.876

MacDonald (1974) states that the 4 factors have been stable over various samples taking the long form as well.

VALIDITY

Content validity. In addition to the SRS, the reliability sample described above (N=193) took a short personal history form; the Pre-marital Sexual Permissiveness Scale (PSPS) (Reiss, 1964); an adaptation of the Semantic Differential (Osgood, Suci, & Tannenbaum) used by Pervin and Lilly; Rokeach's 18 Instrumental and 18 Terminal Values; the F Scale (Rokeach, 1960); the Gough-Sanford Rigidity Scale (Rokeach, 1960); and McDonald's Ambiguity Tolerance Scale. MacDonald (1974) presents correlational analyses between

these measures and the SRS and its 4 factors, which, as a whole support the relationships he predicted. MacDonald states that the consistent positive associations found, for both sexes, between the SRS and its factors and the Terminal Value equality add to the construct validity of the SRS. In addition, factor analysis lends credence to MacDonald's proposal that support for equality between the sexes is multidimensional.

OTHER TECHNICAL INFORMATION GIVEN

The following data are also presented: sex differences between SRS means and variances for the 4 factors for the 53-item short form samples, and the proportion of "no response" answers by the 53-item sample.

RESULTS AND COMMENTS

MacDonald (1974) notes "an important link between attitudes toward homosexuality and support for equality between the sexes" and suggests the SRS may be a useful tool to look into that linkage. The author wants researchers who use the SRS to send him their data (at least means and standard deviations).

SOURCE

The Publications Office
Center for the Study of Human Sexuality
4105 Medical Parkway, Suite 205
Austin, TX 78756

REFERENCE

MacDonald, A. P., Jr. Identification and measurement of multidimensional attitudes toward equality between the sexes. Journal of Homosexuality, 1974, 1, 165-182.

The Social Climate Scales (1974)

An Overview

AUTHOR

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Social Ecology Laboratory
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PURPOSE AND USE

These scales consist of 9 separate scales designed to measure the social climate of various institutional environments. The scales can be used with a broad range of subjects from junior high school age through adults. The 9 measures cover 4 types of environments with 2 or 3 scales within each type as follows:

I. Treatment environments
   1. Ward Atmosphere Scale (WAS)
   2. Community-Oriented Programs Environment Scale (COPES)

II. Total institutions
   3. Correctional Institutions Environment Scale (CIES)
   4. Military Company Environment Inventory (MCEI)

III. Educational environments
   5. University Residence Environment Scale (URES)
   6. Classroom Environment Scale (CES)

IV. Community environments
   7. Group Environment Scale (GES)
   8. Work Environment Scale (WES)
   9. Family Environment Scale (FES)

The potential uses of the Scales are varied and include the following outlined by the author: describing how participants in or observers of a social environment view that environment, comparing and contrasting different environments, evaluating environmental change or impact, providing feedback to effect social change or clinical intervention, enhancing clinical case descriptions, increasing person-environment congruence, and providing cross-cultural environmental comparisons.

DESCRIPTION

Development. Although most people believe that a social environment has an important effect on the people functioning in it, methods to "measure" such environments have been lacking, in contrast to the wealth of personality measures available. These scales were developed to meet the perceived need for such measures. The author, Moos, states that, like personality, "Social environments can be similarly portrayed with a great deal of accuracy and detail. (For example) Some people are more supportive than others; likewise, some social environments are more supportive than others...."

The author, in conjunction with colleagues at the Stanford Social Ecology Laboratory, developed the scales empirically by asking appropriate people about the usual patterns of behavior in their environment. Scales were drafted, piloted, and refined based on statistical item analysis. Some items were adapted from scales developed earlier.

Format. Each scale has 3 basic forms: the Real Form (R) asks people how they perceive their current environment; the Ideal Form (I) asks how they conceive of an ideal environment and the Expectations Form (E) asks prospective members of an environment what they expect the environment to be like. The scales contain between 84-100 true-false items covering 7-10 dimensions. A short form, including 4 items per subscale is available, primarily for use by researchers who want to obtain relatively quick or repeated assessments of a social environment.

Administration. The scales are designed for group administration as a paper-and-pencil questionnaire. Respondents mark their answers on a separate answer sheet. A tape-recorded format is available, to be used with respondents who cannot read at the 6th-grade level or who have a short attention span.

Each scale takes from 15-20 minutes to complete. (A short form takes only 5-10 minutes). Hand-scoring takes only a minute or 2 per test. If more than 1 scale is to be given, separate testing sessions are recommended.

The Manual cautions that care should be taken in arranging for testing in a particular program. Confidentiality of results must be assured.

Scoring. The Scales are hand-scored using a template supplied with the test.

Availability. All Scales are copyrighted by Consulting Psychologist Press. Forms I and E are not available in published forms, but appear in the Manual Appendices.

"The Publishers will normally authorize qualified investigators to reproduce these copyrighted items upon receipt of written request." These forms use the same answer sheets and templates as Form R.

Cost. The Overview Manual costs $1.50.

RELIABILITY

Internal consistency and test-retest stability data appear in the individual scale manuals and are discussed in the separate descriptions following this overview.

VALIDITY

Content validity. Validity of the scales derives primarily from the methods used to develop each scale, which are described in the individual descriptions following this overview.

OTHER TECHNICAL INFORMATION GIVEN

The overview manual provides a detailed discussion of background social climate theory, common dimensions underlying various social environments, proposed utility of the concept, methodological issues, and references. A complete bibliography was prepared in June 1977 and is available from R. Moos, Social Ecology Laboratory, Stanford University.

RESULTS AND COMMENTS

Due to the extensive information available on the Social Climate Scales, individual descriptions have been prepared for 8 of the 9 scales listed above. (The Military Company Environment Inventory is not described.) Features distinctive to each scale are included in the individual descriptions, while features common to all scales have been described in this overview.

SOURCE

Consulting Psychologists Press, Inc.
577 College Ave.
Palo Alto, CA 94306

REFERENCES

Insel, P. M., & Moos, R. H. Psychological environments--expanding the scope of human ecology. American Psychologist, March 1974, 179-188.

Moos, R. H. The Social Climate Scales--An overview. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

WARD ATMOSPHERE SCALE (WAS), 1974

AUTHOR

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Stanford University
Stanford, CA 94305

PURPOSE AND USE

The WAS assesses the social environments of hospital-based psychiatric treatment programs. The Scale may be used to derive detailed descriptions of treatment programs, to compare staff and patient perceptions, to assess program changes over time, and to contrast different programs with each other.

DESCRIPTION

Development. An initial 206-item form (A) was developed by obtaining a pool of items from observations of psychiatric programs, from reading of popular and professional books about such programs, and from interviews of patients and staff. Each item had to identify environmental characteristics that could exert a press, or influence, toward the various subscale dimensions described below. The item pool was reduced to 130 following administration to patients and staff in 14 programs, using criteria of significant program discrimination, 80-20 or less extreme item split, and control for acquiescence response set.

This form (B) was given to 3,575 patients and 1,958 staff from 160 wards throughout the U.S. and Canada, and the final Form R emerged from the analyses as follows: Items with low item-to-subscale correlations and/or extreme item splits were dropped. Items that correlated too highly with each other or with substantial content overlap were dropped. One subscale was dropped due to low internal consistency, and 2 were combined due to high intercorrelations.

Format. The WAS-Form R is a 100-item true-false measure including the following 3 dimensions and 10 subscales: (The number of items follows each subscale in parentheses.)

Relationship dimensions

1. Involvement (10)
2. Support (10)
3. Spontaneity (9)

Treatment program dimensions

4. Autonomy (10)
5. Practical Orientation (10)
6. Personal Problem Orientation (9)
7. Anger and Aggression (9)

System maintenance dimensions

8. Order and Organization (10)
9. Program Clarity (10)
10. Staff Control (10)

(Three additional items are used in subsidiary treatment outcome scales described further in the manual.)

Costs

	Cost	Pkg. size
Specimen set	$ 3.75	
Manual	3.25	
Key	.50	
Reusable Tests	4.25	25
	16.00	100
	75.00	500
Answer Sheets	3.25	50
	15.00	250
	27.50	500
Profiles	1.75	25
	6.00	100
	28.00	500

RELIABILITY

Internal consistency. "Internal consistencies were calculated using average within-program variances for the items, as suggested by Stern (1970). The subscale internal consistencies all fall in an acceptable range, varying from moderate...to substantial...." Kuder-Richardson Formula 20 coefficients range from .55 to .78 (mean = .66) for patients, and from .60 to .82 (mean = .71) for staff.

Stability. Forty-two patients were tested and retested after 1 week, indicating "adequate" short-term stability ranging from .68 to .83. The stability of the overall profile for intervals from 1 week to 3-1/3 years was obtained by calculating intraclass correlations on the standard scores of the different administrations on each program. "The profile stability of wards with a consistent treatment philosophy is extremely high over long periods of time, with stabilities for staff somewhat higher than those for patients, particularly over the longer time intervals." Results indicate that the scale measures aspects of the environment which may remain stable despite complete patient turnover. (A table of stability results appears in the Manual.)

Parallel-forms reliability. "Intraclass profile correlations between the 10 Form R and 10 Form S standard scores were calculated for a sample of 28 university hospital wards." Correlations were above .80 for 25 wards for patients and above .80 for 27 wards for staff.

VALIDITY

Content validity. Evidence of validity may be derived from the empirical methods used to develop the measure, as described above. In addition, correlations between the subscales and background variables (sex, age, and length of stay), as well as social desirability are low, indicating that patient and staff perceptions of treatment milieus are only minimally related to influences from these variables.

Furthermore, intercorrelations between the 10 subscales indicate that the dimensions measure distinct though related characteristics of program atmosphere: "Only a few of the correlations are as high as .40 and .50, accounting for between 16 and 25 percent of the variance."

Additional information on various studies completed with the WAS is in R. Moos, Evaluating Treatment Environments, Wiley, New York, 1974.

OTHER TECHNICAL INFORMATION GIVEN

The Manual presents means and standard deviations for Forms R, S, and I; average item-subscale correlations for Form R subscales; sample program profiles; and standard score conversion tables.

SOURCE

Consulting Psychologists Press, Inc.
577 College Ave.
Palo Alto, CA 94306

REFERENCE

Moos, R. H. Ward atmosphere scale manual. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

COMMUNITY-ORIENTED PROGRAMS ENVIRONMENT SCALE (COPES) 1974

AUTHOR

Rudolf H. Moos
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PURPOSE AND USE

The COPES assesses the social environment of community-based psychiatric treatment programs such as halfway houses, day programs, sheltered workshops, rehabilitation centers, and community care homes. The scale may be used to obtain detailed descriptions of treament programs, to compare patient and staff perceptions, to assess program changes over time, and to contrast different programs with each other.

DESCRIPTION

Development. Items were initially derived from those used in the WAS. Patients and staff familiar with community-oriented programs adapted WAS items and formulated new ones as needed. Items were then sorted by agreement among 3 independent judges into 12 rationally derived subscales parallel to the WAS subscales. A 130-item scale was administered to 373 members and 203 staff on 21 widely diverse treatment programs. In order to derive a final Form R, tryout data were subjected to strict criteria, similar to those used to develop the WAS.

Format. The COPES, Form R, is a 100-item true-false measure comprising the same 3 dimensions and 10 subscales (10 items for each) used in WAS:

Relationship dimensions

1. Involvement
2. Support
3. Spontaneity

Treatment program dimensions

4. Autonomy
5. Practical Orientation
6. Personal Problem Orientation
7. Anger and Aggression

System mainenance dimensions

8. Order and Organization
9. Program Clarity
10. Staff Control

Costs

	Cost	Pkg. Size		Cost	Pkg. Size
Specimen Set	$ 3.25		Answer Sheets	$ 3.25	50
Manual	2.75			15.00	250
Key	.50			27.50	500
Reusable Tests	$ 4.25	25	Profiles	$ 1.75	25
	16.00	100		6.00	100
	75.00	500		28.00	500

RELIABILITY

Internal consistency. KR-20 reliability coefficients were calculated using average within-program item variances. Coefficients range from .62 to .82 (mean = .79) for members, and from .64 to .89 (mean = .78) for staff, indicating "acceptable internal consistency."

Parallel-forms reliability. Intraclass profile correlations between the 10 Form R and 10 Form S standard scores were calculated for 21 programs. Correlations were above .75 for 19 of the programs for members and 18 of the programs for staff. The lowest correlation was .68 for members and .60 for staff.

Stability. Test-retest reliability and profile stability have not been calculated for the COPES, but may be generalized as favorable, according to the author, as based on similarities with the WAS.

VALIDITY

Content validity. Evidence of validity may be derived from the empirical methods used to develop the measure, as described above. In addition, intercorrelations of the 10 subscale scores seem to show that "the ten dimensions measure distinct, albeit correlated characteristics of member and staff perceptions of program atmosphere." Finally, the author maintains that evidence for the WAS that background variables and social desirability have minimal influence on the scale can be generalized to the COPES.

Additional information on various studies completed with the COPES is available in R. Moos, Evaluating Treatment Environments, Wiley, New York, 1974.

OTHER TECHNICAL INFORMATION GIVEN

The Manual presents means and standard deviations for Forms R, S, and I; average item-subscale correlations for Form R subscales; sample program profiles; and standard score conversion tables.

SOURCE

Consulting Psychologists Press, Inc.
577 College Avenue
Palo Alto, CA 94306

REFERENCE

Moos, R. H. Community-oriented programs environment scale manual. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

Correctional Institutions Environment Scale (CIES) 1974

AUTHOR

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Stanford, CA 94305

PURPOSE AND USE

The CIES measures the social environments of both juvenile and adult correctional programs. Primary uses of the CIES are similar to those of the WAS and COPES: to describe programs in detail, in this case correctional units; to assess program changes over time; to compare resident and staff perceptions; and to contrast different programs.

DESCRIPTION

Development. An initial 194-item form was adapted from the initial form of the WAS and from other climate scales by staff and residents familiar with correctional institutions. Other items were added, guided by a general conceptualization of environmental press. This form was administered to residents and staff at 16 correctional units. The resulting 120-item form was administered at over 100 juvenile and 90 adult units in the U.S. and Britain. The final 90-item Form R evolved from data from these tryouts. Items with low item-to-subscale correlations or extreme item splits were dropped, and the Scale was shortened "as much as was consistent with psychometric adequacy and subscale meaningfulness."

Format. The CIES, Form R, is a 90-item true-false measure including the following 3 dimensions and 9 subscales:

Relationship dimensions

1. Involvement
2. Support
3. Expressiveness

Treatment program dimensions

4. Autonomy
5. Practical Orientation
6. Personal Problem Orientation

System maintenance dimensions

7. Order and Organization
8. Clarity
9. Staff Control

Costs

	Cost	Pkg. size
Specimen Set	$ 5.50	
Manual	5.00	
Key	.50	
Reusable Tests	$ 4.25	25
	16.00	100
	75.00	500
Answer Sheets	3.25	50
	15.00	250
	27.50	500
Profiles	1.75	25
	6.00	100
	28.00	500

RELIABILITY

Internal consistency. KR-20 reliability coefficients were calculated on a sample of 22 units using average within-program variances. Coefficients range from .54 to .75 (mean = .66) for residents, and from .54 to .83 (mean = .71) for staff--"all in an acceptable range, varying from moderate to substantial." Adult and juvenile sample reliabilities are similar.

Stability. Test-retest reliability was calculated on 31 residents in 1 facility after a 1-week interval. Reliabilities are all "acceptable," ranging from .65 to .80. Intraclass correlations were used to assess overall profile stability. Correlations were .94 for a 1-week interval, .95 and .96 for 2 1-month interval retestings, and .91 for a 2-year interval. In addition, the average correlation for 13 units in which new treatment programs were introduced, was only .37, indicating that the CIES is sensitive to changes in the environment.

Parallel-forms reliability. "Intraclass profile correlations between the 9 Form R and 9 Form S standard scores were above .80 for 72 units and above .70 for 85 of the 95 units in the resident sample." For the staff sample, they were above .80 for 70, and above .70 for 83, of the 87 units tested.

VALIDITY

Content validity. Evidence of validity may be derived from the empirical methods used to develop the scale, as described above. In addition, intercorrelations of the 9 subscales are generally low, more so with the juvenile samples, indicating fairly distinct subscale measures. "Only a few of the correlations are as high as .40 or .50, accounting for 16 to 25 percent of the variance, and just 2 correlations exceed .50."

Finally, the 9 subscales are relatively independent of sex, age, and length of stay variables. In terms of their relationship to social desirability, "perceptions of correctional milieus appear unrelated to residents', but moderately related to staff members' tendencies to describe themselves in socially desirable ways."

Additional information on various studies completed with the CIES is available in R. Moos, Evaluating Correctional and Community Settings, Wiley, New York, 1975.

OTHER TECHNICAL INFORMATION GIVEN

The Manual presents means and standard deviations for Forms R, S, and I; average item-subscale correlations for Form R; sample program profiles; and standard score conversion tables.

SOURCE

Consulting Psychologists Press, Inc.
577 College Ave.
Palo Alto, CA 94306

REFERENCE

Moos, R. H. Correctional institutions environment scale manual. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

University Residence Environment Scale (URES) 1974

AUTHORS

Rudolf H. Moos
Marvin S. Gerst
Social Ecology Laboratory
Stanford University
Stanford, CA 94305

PURPOSE AND USE

The URES assesses the social climates of university student living groups such as dormitories, sororities, and fraternities. It focuses on the description and measurement of student-to-student and student-to-staff relationships and on the organizational structure of the living group. The Scale may be used to obtain detailed descriptions of residential milieus, to compare different milieus, and to assess changes over time. Relatedly, the URES may be used to compare different residential philosophies as reflected in the type of programs and the residential organizational structures developed at various institutions. The URES is also useful in providing evaluative information, in assessing the adequacy of existing programs and suggesting directions for change.

DESCRIPTION

Development. An initial 238-item form was administered in 13 dormatories. A second 140-item form emerged including items that significantly discriminated among houses, had true-false response splits less extreme than 80%-20%, and did not correlate with the Crowne-Marlowe Social Desirability Scale. The choice of items throughout was guided by general concepts of environmental press. In addition, data from 74 widely diverse residences was used to reduce the total number of items, to reduce content overlap and redundancy, and to minimize overlap among subscales. Revisions were made after each of 3 successive trials, resulting in the final Form R.

Format. The URES, Form R, is a 100-item true-false measure including the following 3 dimensions and 10 subscales. (The number of items follows each subscale in parentheses.) Four items are unscored.

Relationship dimensions

1. Involvement (10)
2. Emotional Support (10)

Personal growth or development dimensions

3. Independence (10)
4. Traditional Orientation (9)
5. Competition (9)
6. Academic Achievement (9)
7. Intellectuality (9)

System maintenance and system change dimensions

8. Order and Organization (10)
9. Student Influence (10)
10. Innovation (10)

Costs

	Cost	Pkg. size
Specimen Set	$ 3.25	
Manual	2.75	
Key	.50	
Reusable Tests	$ 4.25	25
	16.00	100
	75.00	500
Answer Sheets	3.25	50
	15.00	250
	27.50	500
Profiles	1.75	25
	6.00	100
	28.00	500

RELIABILITY

Internal consistency. KR-20 reliability coefficients were calculated on a sample of 13 living groups using average within-program variances. Reliabilities are "all acceptable," ranging from .77 to .88, with a mean of .82.

Stability. The URES was administered 3 times to 83 subjects at a public university. Test-retest correlations range from .67 to .75 after 1 week and from .59 to .74 after 1 month, "indicating adequate stability of individual perceptions over these time intervals." Intraclass correlations were used to assess overall profile stability. These correlations were .96 after 1 week and .86 after 1 month for a men's dorm, and .96 after 1 week and .98 after 1 month for a women's dorm, suggesting excellent temporal stability.

Inter-rater reliability. Because environmental measures should yield a "reasonably high rate of agreement" among residents within a milieu, the homogeneity of perceptions by persons within living groups was computed by calculating the percentage agreement for each subscale over the original sample of 13 dorms. Of 130 comparisons, 113 showed greater than 70 percent agreement among students--"a high degree of consensus among residents."

Parallel-forms reliability. Intraclass profile correlation between the 10 Form R and 10 Form S standard scores for a sample of 82 groups were above .90 for 76 of the groups. None were below .86.

VALIDITY

Content validity. Evidence of validity derives primarily from the empirical methods used to develop the URES, as described earlier. In addition, the average subscale intercorrelations are around .20, showing that the scales measure "distinct, albeit somewhat related, aspects of university living group environments."

Additional information on various studies completed with the URES is available in a set of manuscripts available from R. Moos, Social Ecology Laboratory, Stanford University.

OTHER TECHNICAL INFORMATION GIVEN

The Manual presents means and standard deviations for Forms R, S, and E; sample residence hall profiles; and standard score conversion tables.

SOURCE

Consulting Psychologists Press, Inc
577 College Ave.
Palo Alto, CA 94306

REFERENCE

Moos, R. H., & Gerst, M. S. University residence environment scale manual. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

Classroom Environment Scale (CES) 1974

AUTHORS

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Stanford University
Stanford, CA 94305

Edison J. Trickett
Center for Study of Education
Yale University
New Haven, CT

PURPOSE AND USE

The CES assesses the social climate of junior high and high school classrooms. It focuses on the organizational structure of a classroom and the measurement and description of teacher-student and student-student relationships. The scale may be used to obtain detailed descriptions of classroom environments, to compare different environments, and to assess changes over time. It has been used in studies seeking to relate perceived classroom milieus with variables such as student satisfactions, moods, absenteeism, personality and sociometric traits. It has been used additionally in an evaluation of an experimental high school, in helping students and teachers change the learning environment, and in helping to counsel individual students.

DESCRIPTION

Development. An initial 242-item Form A was used in 25 high school classrooms. Forms B and C were developed from Form A by dropping items not highly correlated with other subscales, and not differentiating among classrooms. Highly correlated subscales were combined, and additional items were added where needed. Form C, a 208-item scale, was tried out on 45 high school classes, and Form R emerged as a result.

Format. The CES, Form R, is a 90-item true-false measure including the following 4 dimensions and 9 subscales (10 items per subscale):

Relationship dimensions

1. Involvement
2. Affiliation
3. Teacher Support

Personal development dimensions

4. Task Orientation
5. Competition

System maintenance dimensions

6. Order and Organization
7. Rule Clarity
8. Teacher Control

System change dimension

9. Innovation

Costs

	Cost	Pkg. Size		Cost	Pkg. Size
Specimen Set	$ 3.00		Answer Sheets	$ 3.25	50
Manual	2.50			15.00	250
Key	.50			27.50	500
Reusable Tests	$ 4.25	25	Profiles	$ 1.75	25
	16.00	100		6.00	100
	75.00	500		28.00	500

RELIABILITY

Internal consistency. Reliabilities were calculated using KR-20 formula and average within-classroom variances for items. Coefficients range from .67 to .86 with a mean of .80.

Stability. Test-retest reliabilities of individual scores on the 9 subscales were calculated on 52 students over a 6-week interval. Reliabilities ranged from .72 to .90. Overall profile stability was calculated for 2-, 4-, and 6-week intervals; average correlations were .94, .85, and .95 respectively, indicating "extremely high profile stability over several weeks."

Parallel-form reliability. Intraclass profile correlations were calculated between the 9 Form R and 9 Form S standard scores for a sample of 38 classrooms. Correlations were above .80 for 34 of the classes; only 1 was below .70.

VALIDITY

Content validity. Validity derives primarily from the methods used to develop the CES, as described above. In addition, average subscale intercorrelations suggest that the subscales measure "distinct though somewhat related aspects of classroom environments."

Additional information on various studies completed with the CES is available in a set of manuscripts available from R. Moos, Social Ecology Laboratory, Stanford University.

OTHER TECHNICAL INFORMATION GIVEN

The Manual presents means and standard deviations for Forms R, S, and I for the normative samples and for Form S for different types of classes; sample classroom profiles; and standard score conversion tables.

SOURCE

Consulting Psychologists Press, Inc.
577 College Avenue
Palo Alto, CA 94306

REFERENCE

Moos, R. H., & Trickett, E. J. Classroom environment scale manual. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

GROUP ENVIRONMENT SCALE (GES) 1974

AUTHORS

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Barrie Humphrey
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Stanford, CA 94305

PURPOSE AND USE

The GES assesses the social environment of psychotherapeutic, social, and task-oriented groups. Main uses for the CES are to obtain detailed descriptions of these groups, to assess group changes over time, to compare member and leader perceptions, and to contrast different groups with each other.

DESCRIPTION

Development. An initial 211-item Form A was developed by choosing items and dimensions judged likely to differentiate among groups. Items were selected by drawing from other Social Climate Scales, other similar indices, and interviews and observations of members and leaders of various groups. Choice was guided by the general concept of environmental press. This Form A was given to members in 30 and leaders in 26 very diverse groups. The final Form R was developed from Form A using 4 criteria: ability to discriminate among groups, as close to 50-50 item split as possible; high intercorrelation of items within a subscale, and control for aquiescence response set.

Format. The GES, Form R, is a 90-item true-false measure comprising the following 3 dimensions and 10 subscales (9 items each):

Relationship dimensions

1. Cohesion
2. Leader Support
3. Expressiveness

Personal growth dimensions

4. Independence
5. Task Orientation
6. Self-Discovery
7. Anger and Aggression

System maintenance and system change dimensions

8. Order and Organization
9. Leader Control
10. Innovation

Costs

	Cost	Pkg. size
Specimen Set	$ .75	
Manual	3.00	
Key	.50	
Reusable Tests	$ 4.25	25
	16.00	100
	75.00	500
Answer Sheets	3.25	50
	15.00	250
	27.50	500
Profiles	1.75	25
	6.00	100
	28.00	500

RELIABILITY

Internal consistency. KR-20 reliability coefficients range from .61 to .86.

Parallel-forms reliability. Intraclass correlations between the 10 Form R and 10 Form S standard scores for a sample of 23 groups were calculated. Fourteen correlations were .90 or higher, 6 ranged from .80 to .89, and the remaining 3 were above .69.

VALIDITY

Content validity. Evidence for validity is derived primarily from the empirical methods by which the GES was developed. In addition, subscale intercorrelations are mostly below .50. Only 2 are above .50 and are not high enough to justify collapsing additional subscales, indicating that subscales measure fairly distinct dimensions.

OTHER TECHNICAL INFORMATION GIVEN

The Manual presents means and standard deviations for Forms R and S, average item-subscale correlations for Form R; sample group profiles; and standard score conversion tables.

SOURCE

Consulting Psychologists Press, Inc.
577 College Ave.
Palo Alto, CA 94306

REFERENCE

Moos, R. H., Insel, P. M., & Humphrey, B. Family, work, and group environment scales - Combined preliminary manual. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

WORK ENVIRONMENT SCALE (WES) 1974

AUTHORS

Rudolf H. Moos
Paul M. Insel
Social Ecology Laboratory
Stanford University
Stanford, CA 94305

PURPOSE AND USE

The WES assesses the social climate of all types of work units, focusing on the following: description and measurement of interpersonal relationships among employees and between managers and employees; the directions of personal growth and development stressed in the work unit; and the basic organizational structure of the unit. Primary uses of the WES are to obtain detailed descriptions of work group environments, to compare employee and manager perceptions, to assess group changes over time, and to contrast different work groups with each other.

DESCRIPTION

Development. An initial 200-item Form A was developed from personal interviews and from other Social Climate Scales. The concept of environmental press guided item selection and wording. After administering Form A to 75 individuals, a 138-item Form B emerged. Form B was given to 624 employees and supervisors in 44 diverse work groups. The data were used to develop Form R using the same psychometric criteria used in deriving the GES and most other Social Climate Scales.

Format. The WES is a 90-item true-false measure including the following 3 dimensions and 10 subscales (9 items each):

Relationship dimensions

1. Involvement
2. Peer Cohesion
3. Staff Support

Personal growth dimensions

4. Autonomy
5. Task Orientation

System maintenance and system change dimensions

6. Work Pressure
7. Clarity
8. Control
9. Innovation
10. Physical Comfort

160

Costs

	Cost	Pkg. size
Specimen Set	$ 3.00	
Manual	.75	
Key	.50	
Reusable Tests	$ 4.25	25
	16.00	100
	75.00	500
Answer Sheets	3.25	50
	15.00	250
	27.50	500
Profiles	1.75	25
	6.00	100
	28.00	500

RELIABILITY

Internal consistency. KR-20 reliability coefficients are "all in an acceptable range," ranging from .70 to .91.

Parallel-forms reliability. Intraclass profile correlations between the 10 Form R and 10 Form S standard scores for 34 work groups were calculated. Twenty-four correlations were above .90, 6 were between .80 and .89, 2 were between .75 and .79, and only 2 were below .75.

VALIDITY

Content validity. Evidence for validity is derived mainly from the empirical methods by which the WES was developed. In addition, subscale intercorrelations average about .25, "indicating that the subscales measure quite distinct though somewhat related aspects of work group milieus."

OTHER TECHNICAL INFORMATION GIVEN

The Manual presents means and standard deviations for Forms R and S, average item-subscale correlations for Form R, sample work unit profiles, and standard score conversion tables.

SOURCE

Consulting Psychologists Press, Inc.
577 College Avenue
Palo Alto, CA 94306

REFERENCE

Moos, R. H., Insel, P. M., & Humphrey, B. Family, work, and group environment scales—Combined preliminary manual. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

FAMILY ENVIRONMENT SCALE (FES) 1974

AUTHOR

Rudolf H. Moos
Social Ecology Laboratory
Stanford University
Stanford, CA 94305

PURPOSE AND USE

The FES assesses the social climates of all types of families, focusing on the measurement and description of the interpersonal relationships among family members, on the directions of personal growth stressed in the family, and on the basic organizational structure of the family. Principal uses for the FES are to obtain detailed descriptions of the social milieus of families, to compare parent and child perceptions, to assess changes over time, and to compare different families.

DESCRIPTION

Development. An initial 200-item Form A was given to over 1,000 persons in 285 diverse families. Data were used to develop a final Form R, according to the same criteria used to derive other Social Climate Scales.

Format. The FES, Form R, is a 90-item true-false measure including the following 3 dimensions and 10 subscales (9 items in each):

Relationship dimensions

1. Cohesion
2. Expressiveness
3. Conflict

Personal growth dimensions

4. Independence
5. Achievement Orientation
6. Intellectual-Cultural Orientation
7. Active Recreational Orientation
8. Moral-Religious Emphasis

System maintenance dimensions

9. Organization
10. Control

An additional score, the Family Incongruence Score, is available to describe how closely members in a family agree.

Costs

	Cost	Pkg. Size		Cost	Pkg. Size
Specimen Set	$ .75		Answer Sheets	$ 3.25	50
Manual	3.00			15.00	250
Key	.50			27.50	500
Reusable Tests	$ 4.25	25	Profiles	1.75	25
	16.00	100		6.00	100
	75.00	500		28.00	500

RELIABILITY

Internal consistency. KR-20 reliability coefficients range from .68 to .86.

Stability. Test-retest reliabilities were calculated on 47 family members for 9 families over an 8-week testing interval. Reliabilities range from .64 to .79.

Parallel-forms reliability. Intraclass profile correlations between the 10 Form R and 10 Form S standard scores for a sample of 11 families were calculated. Ten of these correlations were above .90, and the other 1 was above .80.

VALIDITY

Content validity. Evidence for validity is derived primarily from the empirical methods by which the FES was developed. In addition, subscale intercorrelations average around .20, indicating that "the subscale measures distinct though somewhat related aspects of family social environments."

Additional information on various studies completed with the FES is available in a set of manuscripts from R. Moos, Social Ecology Laboratory, Stanford University.

OTHER TECHNICAL INFORMATION GIVEN

The Manual presents means and standard deviations for Forms R and S; average item-subscale correlations for Form R; sample family profiles; and standard score conversion tables.

SOURCE

Consulting Psychologists Press, Inc.
577 College Avenue
Palo Alto, CA 94306

REFERENCE

Moos, R. H., Insel, P. M., & Humphrey, B. Family, work, and group environment scales--Combined preliminary manual. Palo Alto, Ca.: Consulting Psychologists Press, Inc., 1974.

SRA Opinion Survey for Men and Women (1976)

AUTHORS

Benson Rosen
Thomas H. Jerdee
University of North Carolina
Graduate School of Business Administration
Carroll Hall
Chapel Hill, NC 27514

PURPOSE AND USE

This survey is part of the SRA Sex Discrimination Awareness Program, which was designed to heighten managerial awareness of sex discrimination and to help managers deal with the problem. This survey is intended primarily to assess participants' opinions about the employment characteristics of women, in order to bring out the basic beliefs and prejudices that should be dealt with in an awareness program. In addition, the survey assesses the participants' feelings about the differences in organizational policies toward men and women. The survey can be used as part of the entire Awareness Program or separately to assess the attitudes that underlie employee resistance to working equally with women in managerial positions. The organization can compare individual and group profiles with other individuals and organizations in the U.S. The measure can also be used as a pre- and post-test to assess attitude change.

DESCRIPTION

Development. An experimental form of the survey was constructed and reviewed by SRA staff for relevance, ambiguity and duplication of content. The resulting 93-item form was administered to 846 female managers and 884 male managers and employees with management potential throughout the U.S. in 1975. A point biserial analysis was performed, and individual items were intercorrelated to eliminate overlapping items. The final survey emerged as a result of these analyses.

Format. The survey is a 88-item instrument, including 2 parts: part I, covering 4 general areas of women's employment traits--work attitudes and habits (16 items); interests and motivation (14 items); temperament (18 items); aptitudes, knowledge and skills (20 items)--and Part II, covering attitudes toward organizational policies (20 items). Individuals respond to items on a 5-point scale ranging from "men much more than women" to "women much more than men" in Part I, and from "strongly disagree" to "strongly agree" in Part II.

Administration. The survey can be used as part of the SRA Sex Discrimination Awareness Program or as an independent tool to examine the attitudes and feelings of employees at all organizational levels. It takes about

20-30 minutes to administer and is intended primarily for groups. The program manual presents detailed instructions for administration, depending upon the goals of the organization.

Scoring. Scoring directions are included inside the perforated test booklet, which has a self-contained scoring sheet (a carbon paper transfers responses as the subjects mark their answers).

Availability. © 1976, Science Research Associates, Inc.

RELIABILITY

The authors have reliability data that have not been analyzed.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

Construct validity. Data were analyzed in terms of several variables including type of organization, geographical region, and level of responsibility. Although many analyses yielded no significant results, several significant relationships emerged in an expected direction, giving some evidence for construct validity. Specifically, it was found that female managers scored better than women in general, that men and women over 49 years of age scored worse than younger persons, that people with college educations scored better than those with high school diplomas, that men with female supervisors scored better than men with male supervisors, and women working mainly with men scored better than those working mainly with other women.

OTHER TECHNICAL INFORMATION GIVEN

The Administrator's Guide presents statistical descriptions of norm groups, as well as the means, standard deviations, and mean differences between the national sample and the various subgroups analyzed.

SOURCE

Science Research Associates, Inc.
259 East Erie Street
Chicago, IL 60611

REFERENCES

Rosen, B. Personal communication, February 25, 1977.

Science Research Associates, Inc. SRA Sex Discrimination Awareness Program, Administrator's Guide. Chicago: SRA, Inc., 1976.

SRA Opinion Survey for Women (1976)

AUTHORS

Benson Rosen
Thomas H. Jerdee
University of North Carolina
Graduate School of Business Administration
Carroll Hall
Chapel Hill, NC 27514

PURPOSE AND USE

This survey is part of the SRA Sex Discrimination Awareness Program, which was designed primarily to heighten managerial awareness of sex discrimination and to help managers deal with the problem. This survey is intended to determine the extent of sex discrimination as perceived by female employees by assessing female employee attitudes toward organizational policies affecting women. The survey can be used with participants involved in the entire Awareness Program and with women at all organizational levels. The data are useful to organizations that want to assess and improve their equal employment opportunity (EEO) policies. The survey can be used as a pre- and post-measure to show attitude change. Organizations can also see where they stand in comparison with other organizations in the U.S., and group profiles can be compared with national norms.

DESCRIPTION

Development. An experimental form of the survey was constructed and reviewed by SRA staff for relevance, ambiguity and duplication of content. The resulting 82-item form was administered to 862 female managers and employees in a variety of organizational settings throughout the country in 1975. A point biserial item analysis was performed, and individual items were intercorrelated to eliminate overlapping items. The final survey emerged as a result of these analyses.

Format. The survey is an anonymous 72-item instrument covering 6 areas: the organization's general treatment of women (12 items); the organization's attitudes toward women (16 items); development opportunities available for women (10 items); staffing policies affecting women (16 items); recognition, compensation and time off for women (13 items); and compliance of the organization with EEO laws (5 items). Individuals respond to items on a 5-point scale ranging from "strongly disagree" to "strongly agree."

Administration. The survey can be used as part of the SRA Sex Discrimination Awareness Program or as an independent tool to examine the attitudes and feelings of employees at all organizational levels. The survey takes about 20 minutes and is intended primarily for group administration. The program manual presents detailed instructions for administration depending upon the goals of the organization.

Scoring. Hand-scoring directions are included inside the perforated test booklet, which has a self-contained scoring sheet (a carbon paper transfers responses as the subjects mark their answers).

Availability. © 1976, Science Research Associates, Inc.

RELIABILITY

The authors have reliability data that have not been analyzed.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

Construct validity. Data were analyzed in terms of several variables including type of organization, geographical region, and level of responsibility. Although many analyses yielded no significant results, several relationships emerged in an expected direction, giving some evidence for construct validity. Specifically, it was found that women with higher levels of responsibility scored better, as did employees with female supervisors.

OTHER TECHNICAL INFORMATION GIVEN

The Administrator's Guide presents statistical descriptions of norm groups as well as the means, standard deviations, and mean difference between the national sample and the various subgroups analyzed.

SOURCE

Science Research Associates, Inc.
259 East Erie Street
Chicago, IL 60611

REFERENCES

Rosen, B. Personal communication, February 25, 1977.

Science Research Associates, Inc. SRA Sex Discrimination Awareness Program, Administrator's Guide. Chicago: SRA, Inc., 1976.

STRONG-CAMPBELL INTEREST INVENTORY (SCII) (1933, REVISED 1938, 1945, 1946, 1959, 1964, 1965, 1966, 1968, 1969, 1972, 1974)

AUTHORS

Edward K. Strong, Jr. (1884-1963)

David P. Campbell
Center for Creative Leadership
P. O. Box P-1
Greensboro, NC 27402

PURPOSE AND USE

The SCII was designed to provide data on a person's likes or dislikes for a wide range of occupations, occupational activities, hobbies, amusements, school subjects, and types of people. This 1974 revision of the Strong Vocational Interest Blank, a merging of the men's and women's test booklets, can be used with 11th and 12th grade and college-level students as well as adults, for both counseling and research uses. The SCII can be used in counseling as an aid in making educational and occupational choices; as a vehicle in discussions between student and counselor, and student and parent; as a selection device for those who make employment decisions; as a guide in helping someone modify a self-development plan; and as an aid in helping people understand their job dissatisfaction. The SCII can be used in research to study the characteristic interests of particular occupations, changes in groups, institutions, and/or individuals, general societal trends, cross-cultural influences, and influences on career development.

DESCRIPTION

Development. The SCII is a direct outgrowth of the Strong Vocational Interest Blank (SVIB), which first emerged in 1927 as an empirical interest inventory. Extensive research and revision over the years has continually refined the Basic Interest and Occupational Scales and has led to the recent development of the General Theme Scale (Holland) and the SCII itself, which combines the previously separate men's and women's scales.

Format. Materials for the SCII include a reusable 325-item inventory booklet, an answer sheet, and a scoring profile. The inventory consists of the following 7 sections: Occupations (131 items), School Subject (36 items), Activities (51 items), Amusements (39 items), Types of People (24 items), Preference Between Two Activities (30 items), and Your Characteristics (14 items). The individual responds to most items by filling in either "Like," "Indifferent," or "Dislike" on the answer sheet.

Administration. The SCII is self-administering and can be given to individuals or groups, in person or by mail. The average adult can complete the inventory in a half hour, though completion time ranges from 20 to 60 minutes.

Scoring. The SCII is designed for machine-scoring. The manual presents a list of commercial scoring agencies that can be used. Usually the tests are scored within 1 or 2 days of receipt. Other statistical services, such as item-response frequencies, are available.

Costs (Psychological Corporation Catalog, 1976)

Inventory booklet	pkg/25	$ 6.50
	pkg/100	23.50
NCS-SCII Answer Sheet (7015/7010)	pkg/50	6.00
	pkg/500	54.00
NCS-SCII Machine Scorable Booklet (7015/7010)	pkg/25	4.25
	pkg/100	16.00
Manual	each	5.25
Specimen Set (with manual)	each	6.00
Descriptive Brochure	each	.40

Scoring costs available from Interpretive Scoring Systems (NCS), 4401 W. 76th Street, Minneapolis, MN 55435 and from Mincomp Corporation, 1780 South Bellaire Street, Denver, CO 80222.

Availability. © 1974 by the Board of Trustees of the Leland Stanford Junior University.

RELIABILITY

Stability. Test-retest reliabilities of the earlier SVIB Basic Interest Scales ranged from the .50s for 16-year olds retested after 36 years to the .90s for samples retested within a matter of weeks. Complete data are in the handbook. Reliability of the newer SCII Basic Interest Scale is expected to be higher. Thus far, a 30-day retest study yielded a median coefficient of .88, and a 2-week sample .91, indicating "substantial short-term stability." Test-retest statistics for the Occupational Scales are as follows: For a 2-week sample of high school and college students, the median correlation was .90; for a 30-day sample the median was .88, again indicating substantial short-term reliability.

VALIDITY

Content validity. Each of the Basic Interest Scales was designed to focus on 1 content area, and the items demonstrate this focus clearly.

Concurrent validity. The concurrent validity of the SCII Basic Interest Scales can be shown by comparing scores of people in different occupations to determine whether people are scoring high on scales relevant to their own field and average or lower on unrelated scales. Data from the earlier SVIB Interest Scales (almost identical to the SCII) demonstrate expected patterns. A detailed table in the manual illustrates the differences among occupational samples. For the Occupational Scales, the percent overlaps were computed and averaged 36% (representing a wide range of overlap). This indicates that "the scales vary considerably in their validities. Scales with the highest validities (lowest overlaps) are usually those where the occupation is tightly defined and quite distinct from most other occupations . . . . Scales with low validities . . . are usually those where the occupation is not as well defined . . . ."

Predictive validity. There is "considerable agreement between the scores (on the Basic Interest Scale) earned by students and their eventual occupations." Some scales are less predictive than others, such as the Adventure and Domestic Arts Scales. The less a pattern resembles a typical adolescent pattern, the more a pattern is consistent across the entire profile, the more predictive it is. Extensive longitudinal studies by Strong and subsequent investigators have been done to determine the predictive validity of the Occupational Scales. The main findings show a substantial relationship between high scores and the eventual occupations entered. "Depending upon how the hit rate is calculated, between half and three-quarters of college students enter occupations that are predictable from their earlier scores, assuming that a relatively loose definition of occupation is used . . . ."

OTHER TECHNICAL INFORMATION GIVEN

The 1971 SVIB Handbook is the best source of technical information about scale development validity, reliability, and usage. The newer SCII Manual includes information on scale construction and norms, scale inconsistencies, scale interpretation, sex differences, and special scales relating to such factors as academic orientation and introversion-extroversion.

SOURCES

The Psychological Corporation
757 Third Avenue
New York, NY 10017

Consulting Psychologists Press, Inc.
577 College Ave., P.O. Box 11636
Palo Alto, CA 94306

REFERENCE

Campbell, D. P. Manual for the Strong-Campbell Interest Inventory. Stanford, Ca.: Stanford University Press, 1974.

STUDENT SURVEY, FOURTH AND FIFTH GRADE (1976, REVISED 1977)

AUTHORS

Marlaine E. Lockheed
Abigail M. Harris
Educational Testing Service
Princeton, NJ 08540

PURPOSE AND USE

The survey measures children's sex-role attitudes and stereotypes. It was used in an evaluation of a project funded by a grant from the Women's Educational Equity Act Program.

DESCRIPTION

Development. The survey was given to the entire 4th and 5th grade population of a New Jersey school district (about 1,000 students) in November 1976 and April 1977. It was revised between the 2 administrations.

Format. The survey is composed of 69 items, most of which are multiple choice or yes/no response. Items measure students' attitudes about traditional and non-traditional sex roles, the extent to which their school experiences have been non-sexist, and self-ratings according to sex-type dimensions. The last item is a semantic differential scale. The items are typed in large print in a 24-page, saddle-stitched booklet. Responses are to be marked directly in the booklet.

Administration. The survey is designed for group administration and requires about 1 hour to complete. An administration manual lists materials needed, planning requirements, and instructions to be read aloud to the students.

Scoring. The survey is hand scored. Responses are precoded and may be key punched directly from the booklet. Scoring directions may be obtained from the authors.

Availability. Both the Student Survey and the Administration Manual were copyrighted by the Educational Testing Service in April 1977 and are currently designated as being for research use only.

RELIABILITY

The authors plan to analyze internal consistency and stability (test-retest reliability).

VALIDITY

Plans are to analyze concurrent validity using occupational aspirations, academic attitudes, and behavior as validating measures. (See OTHER TECHNICAL INFORMATION GIVEN.)

OTHER TECHNICAL INFORMATION GIVEN

The authors collected the following additional data from the student sample: their attitudes toward reading and mathematics, cognitive style, occupational stereotypes and aspirations, and achievement. Behavioral data on a subsample of about 160 students were also collected. All analyses will be conducted separately by grade and sex.

RESULTS AND COMMENTS

The authors will provide simple descriptive data (e.g., frequency counts by sex and grade) on the sample. The authors will charge a small amount to cover reproduction costs.

SOURCE

Marlaine E. Lockheed
Educational Testing Service
Princeton, NJ 08540

REFERENCES

Lockheed, M. E. Personal communication, March 1977.

Lockheed, M. E. Personal communication, May 1977.

Lockheed, M. E. Personal communication, June 1977.

Lockheed, M. E., & Harris, A. B. Student Survey: Administration manual. Princeton, N.J.: Educational Testing Service, April 1977.

Teaching Effectiveness Rating Scale

AUTHOR

Committee
San Jose State University
Continuing Education Division
San Jose, CA 95192

PURPOSE AND USE

The purpose of the scale is to allow students to rate the overall effectiveness of their instructors. The scale might be used to show any change in performance after staff development activities. It may also be used as a basic form to which more specific items related to educational equity might be added.

DESCRIPTION

Format. The Teaching Effectiveness Rating Scale consists of 15 statements deemed to be indicative of positive teaching behaviors. Students are asked to rate their instructor on each item based on the following scale: A. Outstanding, B. Very Good, C. Good, D. Fair to Poor, and E. Not Applicable. A space and request for remarks are also provided.

Administration. Instructions for administration are given with the instrument. The scale is meant to be anonymous and students should be allowed to mail responses if desirable.

Scoring. To simplify scoring, the scale might be changed to numbers so that "E" corresponds to "0"; "D" corresponds to "1"; "C" corresponds to "2"; "B" corresponds to "3"; and "A" corresponds to "4". The higher score would indicate a more positive teaching performance.

Cost. None.

Availability. Instrument may be copied from the monograph.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

SOURCE

(Instrument may be copied. There is no copyright and no additional information available.)

TEACHING EFFECTIVENESS RATING SCALE

(Address if desired)

Date_____

Course No. & Title_____ Instructor_____

Location of class_____ Course Period From_____

To_____

You are being asked to rate the effectiveness of your instructor for her/his guidance and ours in the behaviors listed here, using the scale shown below. Use the rating scale below to respond to all 15 items and give your completed questionnaire to a class representative for the instructor. Please, do not sign your name in order to insure anonymity. You may mail the completed form to the above address if you wish. Thanks for your cooperation.

A. OUTSTANDING: the instructor almost always shows this attitude or behavior towards students; students can expect this attitude or behavior to occur consistently in or out of class.

B. VERY GOOD: the instructor shows this attiutde or behavior fairly often, but students cannot count on this attitude or behavior to occur in or out of class.

C. GOOD: the instructor only shows this attitude or behavior when s/he is particularly interested in some subject; students seldom see this attitude or behavior and cannot expect it at any time.

D. FAIR to POOR: the instructor almost never shows this attitude or behavior; the students can expect almost the opposite attitude or behavior in or out of class.

E. NOT APPLICABLE: no way to judge the attitude or behavior in this course.

Mark rating codes above (A,B,C,D, or E)

( ) 1. The instructor makes course requirements clear.

( ) 2. The instructor selects course materials that create continuity for the subject being taught.

( ) 3. The instructor gives class presentations that are easy to follow and understand.

( ) 4. The instructor is well prepared for class.

( ) 5. The instructor encourages expression of student views.

( ) 6. The instructor shows high interest in the subject being taught.

( ) 7. The instructor stimulates student enthusiasm about the subject being taught.

( ) 8. The instructor shows concern for students as individuals.

( ) 9. The instructor shows skill in applying the subject being taught to current problems/issues.

( ) 10. The instructor provides an ample opportunity for student discussion and participation.

( ) 11. The instructor explains his grading criteria.

( ) 12. The instructor collects enough information (student assignments) to have an accurate measure of what the student has learned.

( ) 13. The instructor gives prompt feedback after student assignments.

( ) 14. The instructor gives enough feedback for the student to know what was right and wrong.

( ) 15. Compared to other instructors in similar kinds of classes, the overall teaching in this class has been:

A. OUTSTANDING on most of the above attitudes and behaviors.

B. VERY GOOD on most of the above attitudes and behaviors.

C. GOOD on most of the above attitudes and behaviors.

D. FAIR to POOR on most of the above attitudes and behaviors.

Remarks (especially if none of the above apply):_____

_____

_____

_____

_____

_____

_____

_____

The Tennessee Self Concept Scale (TSCS)
(1956, Revised 1964)

AUTHOR

William H. Fitts
4209 Sneed Road
Nashville, TN 37215

PURPOSE AND USE

The TSCS is designed to provide a multi-dimensional description of the self-concept of subjects, aged 12 or older, having at least a 6th grade reading ability. The scale is ". . .applicable to the whole range of psychological adjustment from healthy, well adjusted people to psychotic patients," and can be used for both counseling and research purposes.

DESCRIPTION

Development. The original item pool was derived from other self-concept measures and written self-descriptions of patients and non-patients. Seven clinical psychologists acted as judges for item classification and selection. The scale was standardized on a sample of 626 persons half of them male and half female, ranging in age from 12 to 68, representing all SES, intellectual, and educational levels (grade 6-Ph.D.), including both blacks and whites. The norm group does not reflect the population as a whole in its composition; overrepresented in number are college students, white subjects, and persons aged 12 to 30 years.

Format. The TSCS consists of 100 items to be rated on a 5-point scale from "completely false" to "completely true." Two forms are available: the Counseling Form and the Clinical and Research Form. Both use the same test booklet and items, but have different scoring scales. The Counseling Form contains 5 scales: A Self-Criticism score (10 items); a Positive score (90 items), including subscales on Identity, Self-Satisfaction, Behavior, Physical Self, Moral-Ethical Self, Personal Self, Family Self, and Social Self; a Variability score; a Distribution score; and a Time score (measure of time the subject requires to complete the scale).

The Clinical and Research Form includes all scores from the Counseling Form as well as a True-False Ratio; a Net Conflict Score (directional); Total Conflict Score (summation); Empirical Scales, including a Defensive Positive Scale (29 items), General Maladjustment Scale (24 items), Psychosis Scale (23 items), Personality Disorder Scale (27 items), Neurosis Scale (27 items), Personality Integration Scale (25 items); and a Number of Deviant Signs Score.

Administration. The TSCS is self-administering, so group or individual administration is possible. The administrator must note the possible confusion in marking answer sheets for the hand-scoring versions (each page in the booklet has odd- or even-numbered items).

The scale is generally completed in 10-20 minutes, 13 minutes being the mean.

Persons desiring to use the Counseling Form should have a guidance certificate or master's degree in guidance and counseling or psychology. Persons desiring to use the Clinical and Research Form for clinical assessment should have substantial training and supervised experience in the clinical use of tests.

Scoring. Both Form C and Form C & R can be hand-scored or machine-scored by the publisher if 5 or more copies are submitted. The computer-scored form is a self-contained booklet, while the hand-scored form includes a test booklet and separate answer sheet that has a carbon and scoring form attached. Hand-scoring directions are included in the Manual. Hand scoring requires 6-7 minutes for the Counseling Form, about 20 minutes for the Clinical and Research Form, and cannot be accomplished with the Computer Form.

Scoring produces a profile based on the scales for whichever form is used. (The appropriate profile sheet should be specified when ordering.) The computer output provides a profile of 29 variables, group means and standard deviations for each variable, and punched IBM output for further statistical work.

The Manual includes 2 sample profiles and models for profile interpretation (". . .in a counseling climate of trust, and acceptance. . . .", in addition to definitions of all scales and scores.

Costs

Item	Cost Per Copy
Hand-scored form	
Test booklet (reusable)	$ .31 (1-99 copies)
	.29 (100 or more)
Combination packet (answer, score, and profile sheets)	.20 (1-99 copies)
	.18 (100 or more)
Computer-scored form	
Test booklet	.20 (1-99 copies)
	.18 (100 or more)
Specimen Set (all test forms plus Manual)	1.50
Manual	.90
Score Keys (set of 6)	1.10
	Cost Per Test
Computer Processing	$2.00 (5-9 tests)
	1.25 (10-21 tests)
	.70 (22-49 tests)
	.55 (50-499 tests)
	.50 (500 and over)

The Manual states the following regarding scoring costs: "If you wish your tests scored by sub-groups we will furnish means and standard deviations separately for each sub-group for the 29 profile variables. Since each sub-group requires an entirely separate computer run, your charges for each sub-group will be based on the above price schedule."

Availability. © 1964, William H. Fitts.

RELIABILITY

Stability. Sixty college students were tested and retested after 2 weeks. Reliability coefficients for the scales and subscales ranged from .60 to .92. The author reports on other studies showing reliability over time.

VALIDITY

Content validity. Validity is based on developmental procedures wherein items were derived from similar measures and from written self-descriptions and subjected to examination by a panel of experts.

Construct validity. The TSCS was given to 369 psychiatric patients and 626 non-patients. Statistical analyses demonstrate highly significant differences between patients and non-patients for almost every score. The manual reports on other studies that also demonstrate this difference.

A cross-validation sample included 100 students from Ohio State University and subjects from 3 patient groups--an Ohio State hospital group (n=125), a community mental health center group (n=459), and a VA psychiatric hospital group (n=100).

Numerous figures and tables show differing scores for the various groups, and provide additional validation evidence. In addition, test-retest scores of patients in therapy shows predicted improvement as patients improve.

Concurrent validity. The Manual presents abundant data on the correlations between the TSCS and the MMPI, the Edwards Personal Preference Scale, and 10 other personality measures.

OTHER TECHNICAL INFORMATION GIVEN

The Manual also presents intercorrelations of the scales, norms and standard deviations for the scales, and extensive references. A bibliography of over 1,000 annotations is available from the author. A series of 6 research monographs, summarizing TSCS research on various topics, is available from the publisher.

SOURCE

Counselor Recordings and Tests
Box 6184
Acklen Station
Nashville, TN 37212

REFERENCE

Fitts, W. H. Manual for the Tennessee self concept scale. Nashville: Counselor Recordings and Tests, 1965.

VALUES CHECKLIST (1976)

AUTHOR

Council on Interracial Books
for Children (CIBC)
1841 Broadway
New York, NY 10023

PURPOSE AND USE

The purpose of this instrument is to provide a rating of the content of children's books in terms of the values it presents. The checklist may be used to rate children's books and other printed educational materials.

DESCRIPTION

Development. CIBC developed this checklist, based on 9 years of work in reviewing children's books for racism and sexism. Meetings were held with third world and feminist reviewers to develop criteria to be used by the Human Values Book Project. Initially, reviewers were concerned primarily with racism, sexism, and cultural authenticity. Subsequently, they noted the relationship of those concerns with materialism and individualism. The criteria were expanded to include all the negative values to be removed from children's books. The checklist was developed to reflect those concerns. The checklist is part of Chapter 1 of Human (and Anti-Human) Values in Children's Books, published in 1976 by CIBC. That chapter explains in depth each criterion for the checklist.

Format. The 1-page checklist allows a reviewer to rate both art and words on 11 criteria and to rate literary quality and art quality from excellent to poor. The 11 criteria define the extent to which the book is racist, sexist, elitist, materialistic, individualist, ageist, conformist, escapist, and culturally authentic, and the extent to which it builds positive or negative images of females/minorities and inspires action vs. oppression. The reviewer checks a box for each criterion ("Not Applicable" is an option).

Administration. An individual or a team of reviewers may use this checklist. Due to copyright restrictions, we have not included the text of the chapter defining the criteria. However, a reviewer must read that chapter to be able to use the checklist.

Scoring. Each reviewer needs to determine what defines an adequate score. The total score should represent the extent to which educational materials reflect positive or negative values. The text upon which the value judgements are based should be read by the user. The text is available from CIBC.

Cost. A paperback edition of Human (and Anti-Human) Values in Children's Books costs $7.95 (hardcover is $14.95). CIBC plans to publish the chapter containing the checklist as a separate booklet.

Availability. © 1976, Council on Interracial Books for Children, Inc.

RELIABILITY

So far as we have been able to determine, no one has examined the reliability of this checklist.

VALIDITY

Content validity. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

RESULTS AND COMMENTS

Human (and Anti-Human) Values in Children's Books presents reviews of over 200 books rated by reviewers using the checklists.

SOURCE

Council on Interracial Books for Children (CIBC)
1841 Broadway
New York, NY 10023

REFERENCES

CIBC Racism and Sexism Resource Center for Educators. Human (and Anti-Human) Values in Children's Books. New York: Council on Interracial Books for Children, 1976.

Moore, R. B. Personal communication, March 1977.

Vocational Interest, Experience, and Skill Assessment (VIESA) (1976)

AUTHOR

Staff of the American College
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PURPOSE AND USE

VIESA is a self-scored inventory of career-related skills, interests, and experiences, intended for use by teachers, counselors, or supervised paraprofessionals. It is designed to stimulate self/career exploration by students in grades 8-12, and is intended to serve as a teaching module as well as an assessment instrument. In completing VIESA, students learn a simple but complete structure for organizing information about themselves and the world of work, defined in 6 job clusters and 25 job families. VIESA's goals are closely related to the goals of the Career Planning Program (CPP), also developed by ACT, and can be used in conjunction with the CPP depending on local needs and resources. Both programs use sex-balanced reporting procedures that suggest similar career options to males and females.

DESCRIPTION

Development. Realizing that traditionally narrow views of guidance testing were inadequate for more current theories of career development, the designers of VIESA focused on the following concepts: (1) Testing should be only one part of a school's career guidance program; (2) The major role of guidance tests is to stimulate self and career exploration; (3) Reports of test results must enable counselors and students to interpret test scores meaningfully; (4) Students must be helped to transform test information into personally relevant experience.

VIESA components were developed over a period of years (1972-1976) through an extensive series of studies. An overview of these studies is presented in the User's Handbook. VIESA norms are based on a carefully chosen subgroup of a nationally representative sample of some 32,000 students in 200 schools selected according to geographic region, socioeconomic status and size of community, and school size. The target population was all full-time students in grades 9-11 enrolled in public or parochial schools in the spring of 1973.

Format. VIESA includes the following components: (1) A 60-item version of the Unisex Edition of the ACT Interest Inventory (UNIACT), which summarizes the student's work-related activity preferences according to general orientation to data, ideas, people, or things; possible responses are "like," "dislike," or "?"; activities are divided into 6 Holland-type scales; (2) the Career-Related Experience Inventory, a 60-item checklist designed to assess the student's everyday experiences, again in terms of data, ideas, people, or things; (3) a brief self-rating of skills organized into the same 4-pronged structure as described above; and (4) a job preference question asking students to name their first job preference and to identify its job family. These 4 inventories as well as career exploration aids are included in 2 student documents, a Career Log and a Career Guidebook.

Administration. VIESA can be used individually in counseling on an as-needed basis or with groups as part of a developmental career guidance program. If it is used with groups, an experienced administrator can work with groups of 30-35 students in grades 11-12, or with 15 in grades 8-9. Most students can complete the key parts of VIESA in a 40-45 minute class period. The experience inventory usually takes longer. However, a 3-session administration model is recommended to ease assimilation of results by students. Detailed administration procedures are outlined in the Handbook.

Scoring. VIESA is scored by students directly after completing the inventory. Directions are available in the Handbook.

Costs (from the VIESA order form)

Item	School Price[1]
Examination kit	$ 2.85
User's handbook	2.55
Career log and guidebook (pkg/35)	13.80

Availability. © 1976 by The American College Testing Program. Available from the Houghton Mifflin Company.

RELIABILITY

Internal consistency. For the UNIACT-IV, the coefficient alpha reliability estimates for 6 scales assessing Holland types ranged from .85 to .92 with a median value of .87. Split-half reliability estimates for the 2 bipolar interest scales (Data/Ideas and Things/People) were .75 and .82 respectively, indicating considerable reliability.

For the Career-Related Experience Inventory, reliability data from the Career Planning Program are used because of the close similarity between the 2 instruments. (Three scales are identical; 1 differs in only 3 of 15 items.) Coefficient alpha reliabilities for the 4 scales for an 11th grade norm group are as follows: Data (.74), Ideas (.82), People (.82), Things (.89). Reliability estimates for a similar sample for 8th graders ranged from .76 to .85.

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[1] School price includes the regular educational discount. It does not include transportation, handling, or state or local tax. Prices are subject to change.

Stability. Although stability coefficients for the UNIACT-IV have not yet been run, coefficients for similar scales in the ACT Interest Inventory (ACT-IV) ranged from .80 to .89 for retesting after 8 weeks. Stability of the Career-Related Experience Inventory is indicated by test-retest (after 9 week) coefficients, which ranged from .70 to .86 for 445 9th graders and from .72 to .87 for 340 11th graders. (For all practical and statistical purposes, VIESA and CPP experience scales are indentical. See above.)

VALIDITY

Construct validity. The User's Handbook presents data and discusses in detail the relationship between the theoretical bases of VIESA (Holland types and Data/Ideas and People/Things Work Dimensions) and the UNIACT-IV results. For example, data support the expectation that the Data/Ideas scale would correlate positively with business detail and contact interests, and negatively with science and creative arts interests. Principal component factor analysis revealed factors corresponding closely to the theoretical factors upon which the test was based. Correlations between the UNIACT-IV bipolar scales and the corresponding theoretical factors are .84 and .83 for the Data/Ideas and Things/People scales, respectively, "thus indicating that the two scales provide adequate measures of the theoretical dimensions."

Concurrent validity. Correlations between the 6 pairs of similar scales on the UNIACT-IV and the ACT-IV ranged from .76 to .86, with a median of .80. Correlations between the same scales and the Vocational Interest Profile (VIP) ranged from .72 to .86 with a median of .74. Since the sex-balance of item content is much greater in the UNIACT-IV, these correlations are considered to be high. Intercorrelations for the Career-Related Experience Scales and the CPP-8-12 interest scales measuring similar dimensions show satisfactory validity. In a 10% national sample, nearly half the correlations between parallel experience and interest scales were greater than .50.

OTHER TECHNICAL INFORMATION GIVEN

The Handbook reports results of several studies comparing the criterion-related validity of normed (same-sex norms) and raw scores, and 3 comparisons of the construct validity of sex-restrictive and sex-balanced interest scores. The Handbook also provides a summary of the samples used in item tryouts, as well as means, standard deviations, and scale intercorrelations for the UNIACT-IV. A more complete account of UNIACT-IV characteristics, including interest profiles for 152 educational and vocational criterion groups (n = 26,656), is provided by Hanson, Prediger and Schussel (1977).

SOURCE

Houghton Mifflin Co.
5 regional sales offices:
686 Miami Circle, N.E., Atlanta, GA 30324
6626 Oakbrook Blvd., Dallas, TX 75235
1900 So Batavia Ave., Geneva, IL 60134
Pennington-Hopewell Rd., Hopewell, NJ 08525
777 California Ave., Palo Alto, CA 94304

REFERENCES

American College Testing Program. Vocational interest, experience, and skill assessment. User's handbook. Boston: Houghton Mifflin Co., 1976.

Hanson, G. R., Prediger, D. J., & Schussel, R. H. Development and validation of sex-balanced interest inventory scales. (ACT Research Report No. 78). Iowa City, Iowa: American College Testing Program, 1977.

Wellesley Role Orientation Scale (WROS)
(Revised 1974)

AUTHOR

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PURPOSE AND USE

The WROS was designed to measure the sex-role preferences of college women. It provides information on 3 aspects of role preference:

1. Traits college women generally regard as "feminine" rather than "masculine";

2. Role activities college women find acceptable for themselves as women; and

3. Career, or career-oriented, activities college women consider appropriate only for men.

Alper specifies that the scale is to be used for research purposes only. The WROS could indicate a change in role preference after an instructional program.

DESCRIPTION

Development. The WROS grew out of research in the area of achievement motivation and the relative dearth of information about the achievement, motivation and role orientation of women. A set of hypotheses were developed, based on the main assumption that traditionally role-oriented women are less likely to be achievement-oriented than women whose role orientation is non-traditional.

In developing the WROS, Alper asked psychology students to submit a number of sex-role relevant statements. Analysis of the statements obtained yielded the 3 role preference categories described earlier. Final selection of items and "filler" items was determined by the use of 2 successive Q sorts done by the same students. These items were then pilot-tested with groups of undergraduates, and a 24-item scale emerged. The initial study using the WROS involved 35 Wellesley undergraduates (20 1st year and 15 3rd year students). Successive studies have been done since 1964. Alper revised the WROS in 1974.

Format. The WROS is a 24-item Likert-type scale. Individuals respond to statements on a 6-point scale ranging from "strongly agree" to "strongly disagree" (from +3 to -3). There are 7 items for each of 3 subscales

(feminine traits, feminine role activities, and male-oriented careers), and 3 unscored "filler" items. In the revised WROS, the 24 items are imbedded in the 38-item Traditional Family Ideology Scale (TFI) developed by Levinson and Huffman (1955)[1]. The 24 items are 1, 6, 8, 11, 16, 22, 26, 28, 30, 32, 34, 35, 37, 39, 40, 43, 44, 45, 50, 54, 55, 59, 61, 64.

Administration. The WROS is a self-administering scale, which may be given to groups or individuals. Thus far, it has been used exclusively with groups for research purposes. Imbedded in the TFI, the WROS takes about 20-30 minutes to complete.

Scoring. The WROS is hand-scored, but could be adapted for machine-scoring. A scoring key is available from the author.

Availability. The WROS is in the process of being copyrighted. Permission to reproduce the scale is required by the author.

Cost. $2.00 per copy (for use in research studies only).

RELIABILITY

Internal consistency. Split-half reliability coefficients were .58 for the initial study and .60 ($p < .01$) for the replication study--both "well within the limits of statistical significance."

Stability. Test-retest data for a group of 25 upperclasswomen, retested after a semester, were "well within the limits of acceptability" (RHO = .70, $p < .01$).

VALIDITY

Construct validity. WROS respondents also completed a brief questionnaire indicating what they expected to be doing 1 year to 10 years after graduation, and what they would like to be doing. To validate the WROS, more low-scoring subjects (nontraditionalists) should be planning on a career. In fact, the expectation data for a year after graduation support this ($p < .01$), and the preference data clearly do so ($p < .01$). No differences appear in the data for the years after graduation, supporting other data (Rostow, 1964)[2] showing that middle-class female samples want to marry eventually regardless of role orientation.

Concurrent validity. Repeated efforts to correlate the WROS with 2 apparently similar measures--the Fe subscale of the CPI (Gough, 1957) and the Crowne-Marlowe Social Desirability Scale (1964)--have failed to yield significant relationships. On the other hand, correlations with the TFI have been consistently positive and highly significant. Significant correlations in the expected negative direction between the WROS and Rosenkrantz's sex-stereotype measure (1968) have been obtained with only 1 sample of lower-middle-class junior college women.

---

[1] Levinson, D., & Huffman, P. E. Traditional family ideology and its relationship to personality. Journal of Personality, 1955, 23, 251-273.

[2] Rostow, E. G. Conflict and accomodation. Daedalus, 1964, 736-760.

OTHER TECHNICAL INFORMATION GIVEN

Articles regarding use of the WROS present summaries of the literature on achievement motivation, results of the studies showing the relationship between role-orientation and achievement imagery, and extensive references.

SOURCE

Thelma G. Alper
51 Harvard
Brookline, MA 02146

REFERENCES

Alper, T. G. Achievement motivation in college women--A now-you-see-it-now-you-don't phenomenon. American Psychologist, 1974, 29, 194-203.

Alper, T. G. The relationship between role-orientation and achievement motivation in college women. Journal of Personality, 1973, 41, 9-31.

Alper, T. G. Personal communication, May 1977.

Women as Managers Scale (WAMS) (1974)

AUTHORS

Lawrence H. Peters
University of Texas
at Dallas

James R. Terborg
University of Illinois
at Champaign-Urbana

PURPOSE AND USE

The WAMS was designed to assess attitudes toward women in business situations. The authors propose 4 possible uses for the scale: (1) to define the existing barriers that inhibit the successful integration of women into management positions; (2) to assess the current situation in particular business organizations by providing a profile of employee attitudes relative to normative data; (3) to serve as an independent or a dependent variable in laboratory research (e.g., attitude change research); and (4) to serve as a "before" and "after" measure in assessing the treatment effect of training programs.

DESCRIPTION

Development. The WAMS was standardized on a sample of 541 undergraduates (346 male and 196 female) from 4 institutions: Purdue (n = 233), Southern Illinois University (n = 106), Georgia State University (n = 118), and College of Lake County (n =84). Data were collected during spring and summer sessions in 1973, and include age, sex, and self-reported liberal-conservative attitudes toward the women's rights movement. Data are currently being collected on more diverse samples.

Format. The WAMS consists of 21 Likert-type items to be rated on a 7-point scale ranging from "strongly disagree" to "strongly agree." The scale represents the following 3 factors: Acceptance of women into managerial positions (10 items); female-specific barriers that traditionally have been viewed as prohibitive of permanent, full-time employment (5 items); and traits necessary for success in a managerial position (6 items).

Administration. The scale is designed for group administration.

Scoring. The scale is hand-scored by summing the values of the responses. Some items are reverse-scored.

Cost. $2.00 for the JSAS document cited below.

Availability. Potential users should contact the authors for permission to use the scale.

RELIABILITY

Internal consistency. Split-half (odd-even) reliability for the final form was .84 ($p < .001$, $n = 541$), and .91 when corrected for length of test by the Spearman-Brown formula.

VALIDITY

Construct validity. The correlation between the self-rated liberal-conservative attitude and the WAMS was .54 for males and .42 for females, a significant correlation as expected by the authors. In addition, Terborg and Ilgen (1975) report a correlation of .58 with the subjects' decision to hire a female engineer.

Terborg et al. (1977) present additional data on a study with a sample of 180 male and 100 female full-time employees of an international distributing company. The study collected data to test 4 predictions: (1) females would have more favorable attitudes toward women as managers than would males, (2) respondents of either sex whose mothers were employed outside the home when the respondents were children/adolescents would have more favorable attitudes toward women as managers than respondents whose mothers were not employed, (3) for respondents of each sex, there would be a positive relationship between attitudes toward the women's rights movement and attitudes toward women as managers, and (4) for female respondents only, there would be a positive relationship between degree of career commitment and favorability of attitudes toward women as managers.

Concurrent validity. Terborg and Ilgen (1975) found a low correlation ($r = 13$, $p > .10$) between the WAMS and the Crowne-Marlowe Social Desirability Scale.

OTHER TECHNICAL INFORMATION GIVEN

The JSAS presents item analysis data and normative data for the 3 factors and the total questionnaire. Garland and Price (1977) present evidence for cross-situational stability of the scale as a measure of generalized attitudes toward women in management.

SOURCE

Journal Supplement Abstract Service
American Psychological Association
1200 - 17th Street, N.W.
Washington, D.C. 20036

(Manuscript No. 585)

REFERENCES

Garland, H., & Price, K. H. Attitudes toward women in management and attributes for their success and failure in a managerial psoition. Journal of Applied Psychology, 1977, 62(1), 29-33.

Peters, L. H., Terborg, J. R., & Taynor, J. Women as managers scale (WAMS): A measure of attitudes toward women in management positions. JSAS Catalog of Selected Documents in Psychology, 1974, 4, 27. (MS No. 585)

Terborg, J. R., & Ilgen, D. R. A theoretical approach to sex discrimination in traditionally masculine occupations. Organizational Behavior and Human Performance, 1975, 13, 352-376.

Terborg, J. R., Peters, L. H., Ilgen, D. R., & Smith, F. Organizational and personal correlates of attitudes toward women as managers. Academy of Management Journal, March 1977, 89-100.

Women's Liberation Scale (WLS) (1976)

AUTHOR

Carlos Goldberg
Psychology Department
Indiana/Purdue University
1201 East 38th Street
Indianapolis, IN 46205

PURPOSE AND USE

This scale measures attitudes toward positions advocated by groups in the women's liberation movement. The author has not suggested possible uses but states that subjects who obtain a low score on this scale are more likely to endorse sex role stereotyping than those who obtain a high score.

DESCRIPTION

Development. Goldberg administered the WLS to 102 male and 102 female introductory psychology students at Indiana University-Purdue University at Indianapolis in 1974. A pilot study (Goldberg, 1975) also tested some female members of the National Organization of Women (NOW).

Format. The WLS consists of 14 items to be rated on a 4-point, Likert-type scale from "strongly disagree" to "strongly agree." To control for response set, "strongly agree" appears first for half of the items and "strongly disagree" appears first for the other half.

Administration. Either individual or group administration is possible. The JSAS document cited below includes directions required for administration and scoring.

Scoring. The test administrator may hand score the WLS simply by summing the response to each item. The score for each item ranges from 1 to 4, with total scores ranging from 14 to 56. A high score indicates a favorable attitude toward the women's movement.

Cost. $4.00 for paper copy, $2.00 for microfiche for the JSAS document cited below.

Availability. Potential users should contact the author for permission to use the scale.

RELIABILITY

Internal consistency. Goldberg states that the scale seems to be internally consistent. Split-half reliability coefficients of .65 for males and .75 for females are reported.

VALIDITY

Construct validity. Validity is based on the assumption that females have a more favorable attitude toward the women's movement than males do. Results of the Indiana University-Purdue University study show females scoring higher than males on the WLS (female mean = 41.08, male mean = 37.52; F=22.31, P=.0001). Results from the pilot study, noted above, show the higher scores of women who belong to NOW compared with women in a control group.

Concurrent validity. Goldberg (1975) administered the WLS, a conformity measure, and a short form of Gough's Masculinity-Femininity scale to the 204 pilot test subjects. He found that subjects who obtained low scores on the WLS tend to conform more than those with high scores, and are more likely to endorse stereotypes of sex-related abilities. In another study, 40 male and 40 female college students at Indiana University-Purdue University at Indianapolis took the WLS and the Attitudes Toward Women Scale (AWS), developed by Spence, Helmreich, and Stapp in 1973. Correlation between the WLS and AWS was .60 for males and .65 for females, which is statistically significant ($p < .001$).

OTHER TECHNICAL INFORMATION GIVEN

Mean scores for the 3 groups in the pilot study were as follows: Males= 37.94, females=40.94, and females in NOW=51.10 with a control group of females having a mean of 41.25. (The control group was not described further.)

SOURCE

Journal Supplement Abstract Service
American Psychological Association
1200 - 17th Street, N.W.
Washington, D.C. 20036

(Manuscript No. 1187)

REFERENCES

Goldberg, C. Conformity to majority type as a function of task and acceptance of sex related stereotypes. Journal of Psychology, 1975, 89, 25-37.

Goldberg, C. Women's liberation scale (WLS): A measure of attitude toward position advocated by women's groups. Journal Supplement Abstract Service, American Psychological Association, Manuscript No. 1187. Washington, D.C., 1976.

Work Atmosphere Questionnaire (form WAQ-1c) (1976)

AUTHORS

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Test Analysis and Development Corp. (TADC)
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Boulder, CO 80303

PURPOSE AND USE

The Work Atmosphere Questionnaire provides information regarding employee-employer relations and work resources. It was designed to be used both for program evaluation and for individual counseling. The WAQ-1c is one of several measures developed at TADC, whose goal is to help individuals and organizations achieve their own goals in an effective and efficient fashion. Another of TADC's measures, the Self Esteem Questionnaire, is also described in this monograph.

DESCRIPTION

Development. Items were written to provide information about several aspects of the work situation. The aspects are Work Planning and Coordination, Work Incentive, Work Environment, Supportiveness, Performance-Productivity, and Positive Interaction Influence. Relevant items were then drafted and submitted to samples of respondents for review. Respondents were told the intent of the measure and were asked to suggest additional items and revisions for the proposed items. Items were subjected to the cluster analytic procedures developed by Robert D. Tryon and Daniel E. Bailey. To be included in the final measure, all items had to have oblique factor coefficients of at least .50.

Format. The WAQ consists of 38 Likert-type items, grouped under 3 headings--My Supervisor, My Co-workers, and In My Work Situation. Respondents rate the items on a 5-point scale from "Not At All" or "Never" to "Always."

Administration. The measure is self-administered and may be given to groups or individuals. Administration directions are given with the questionnaire and in the manual.

Scoring. A special computerized scoring process called Convergence Analysis should be used to score the WAQ. This process is designed to scan a person's responses to determine whether they meet a minimum validity requirement of response consistency. A score is computed only if the person has responded in a reasonably consistent fashion to the items used to measure that factor. The WAQ may be scored by TADC, and computer programs for scoring are available as well. Additional scoring information is given in the manual.

Costs. The price given below were effective July 1, 1976 and are subject to change without notice.

Quantities	Scoring (Including Answer Sheet)	Answer Sheet Only
1-1,000	.75 per copy	.20 per copy
1,001-2,500	.65 " "	.15 " "
2,501-5,000	.55 " "	.12 " "
5,001-more	.45 " "	.10 " "

Minimum scoring charge	$50.00
Cost to build name file for preprinting	.15 per person
Cost to preprint ID information	.10 per document
Minimum handling charge	5.00

Availability. © 1976 by James K. Hoffmeister. The computer programs for scoring may be obtained from TADC. Ask for the Test Analysis and Reporting Package.

RELIABILITY

Specific reliability data are not available for this measure. The only information available is that generalized split-half (Cronbach's alpha) reliabilities range from .89 to .94 for several instruments developed by TADC.

VALIDITY

Content validity. Evidence of content validity derives from the item review and cluster analysis process that the questionnaire went through during its development. Validity was established through procedures described on pages 6 and 7 of this monograph. Reviewers recommended including this instrument in the Measurement Instrument Package.

OTHER TECHNICAL INFORMATION GIVEN

The WAQ-1c is being used with nurses in studies designed to provide information about the effect of work barriers upon productivity. Data will not be available for several years though.

The manual includes information about the 7 other TADC measures (e.g., Health Attitude and Practices Questionnaire, the Conceptual Systems Test, and other atmosphere questionnaires).

RESULTS AND COMMENTS

Technical data are very limited. The developer would like to receive results from persons who use the Work Atmosphere Questionnaire.

SOURCE

James K. Hoffmeister
Test Analysis and Development Corp. (TADC)
855 Inca Parkway
Boulder, CO 80303

REFERENCE

Hoffmeister, J. K. Some information regarding the characteristics of the two measures derived from the Self Esteem Questionnaire (SEQ-3). Boulder, Co.: Test Analysis and Development Corporation, 1976.

Work Environment Preference Schedule (WEPS)
(1968, revised 1973)

AUTHOR

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PURPOSE AND USE

"The WEPS is designed to measure a personality construct, 'bureaucratic orientation,' which reflects a commitment to the set of attitudes, values, and behaviors that are characteristically fostered and rewarded by bureaucratic organizations. . . . Scores on the WEPS can be expected to relate to industrial turnover and morale." Vocational counselors could use the WEPS scores in guidance, employers could use them for job assignment, and researchers could use them to measure the impact of bureaucracy on personality.

DESCRIPTION

Development. A set of categories describing individual characteristics such as traditionalism and self-subordination was identified, based on the descriptive schema of Max Weber (1946)[1]. Items were developed and worded so that agreement would mean acceptance of the bureaucratic norm. Data for item analysis were collected from samples of both sexes and diverse populations including a nationally representative sample of civil service workers, students in trade training programs, college and high school students, and military personnel. Items with the best internal statistics across samples were chosen for the final scale.

Format. The WEPS consists of 24 Likert-type items, evenly distributed across these 4 categories: Self-subordination, Impersonalization, Rule Conformity, and Traditionalism. Responses are on a 5-point scale ranging from "strongly agree" to "strongly disagree."

Administration. THE WEPS is a self-administering scale, which can be given to groups or individuals. There is no time limit, and most people complete it in 10-15 minutes. Complete administration directions are provided in the manual.

Scoring. The WEPS is easily hand-scored with no stencil needed. A machine-scorable version is available for large-scale surveys. Scoring directions are given in the manual.

Availability. © 1968, 1973 by the Psychological Corporation.

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[1] Weber, Max. Essays in sociology. (Translated by H.H. Gerth & C.W. Mills) New York: Oxford University Press, 1946.

RELIABILITY

Internal consistency. Reliability coefficients were .91, .89, .84, and .83, respectively, for samples of Peace Corps volunteers, guidance counselors, business and management students, and U.S. Military Academy seniors. The higher values occurred for the 2 groups with both sexes.

Stability. A small group of high school students took the WEPS before and after a summer work program (3 month interval). The test-retest correlation was .82. ROTC students took the WEPS twice with a 16-month interval, with a resultant correlation of .65.

VALIDITY

Concurrent validity. The manual presents detailed descriptions and data from studies comparing WEPS scores with those of numerous other personality scales including Gordon's Survey of Interpersonal Values, and Allport, Vernon, and Lindzey's Study of Values. Overall results confirmed expected relationships such as positive correlations with conformity and orderliness and negative correlations with independence, variety, and aptitude and achievement.

Construct validity. If the WEPS study measures the extent to which an individual endorses attitudes and behaviors inherent in the classical bureaucratic model, then it would be expected to correlate positively with an individual's desire to remain in such an environment, the military in particular. Three studies are described, which essentially support this hypothesis. Validity of the WEPS was also demonstrated by the mean score of various groups presumed to vary in terms of degree of bureaucratic orientation. High means were found for persons whose duties were highly defined, while lower means were found for persons who worked under little supervision.

OTHER TECHNICAL INFORMATION GIVEN

As stated above, the manual contains extensive data and descriptions of validation efforts including correlations with other measures, cross-cultural studies in Japan and India, studies based on performance ratings and peer ratings, and group comparisons. In addition, normative data are presented for high school and college students, ROTC students, and for a selection of occupations.

Gordon has additional references accumulating, which he will include in a forthcoming revision of the manual.

SOURCE

The Psychological Corporation
757 Third Avenue
New York, NY 10017

REFERENCES

Gordon, L. V. Work Environment Preference Schedule--Manual. New York: The Psychological Corporation, 1973.

Gordon, L. V. Personal communication, May 6, 1977.

Work Values Inventory (WVI) (1968)

AUTHOR

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PURPOSE AND USE

The WVI is designed to measure the values of work, both intrinsic and extrinsic--in other words, the satisfactions that people seek in work, and the satisfactions that may be outcomes of work. The inventory produces a profile of self-reported value patterns of the student (respondent) and provides insight into the student's value hierarchy by allowing comparison with other respondents or with persons in a variety of jobs.

It may be used for age levels ranging from junior high school through adult in academic or vocational guidance settings, for screening applicants to business and professional schools, and for selection and placement in business or industry.

DESCRIPTION

Development. The author conducted standardization studies in the spring of 1968 on a national sample of 10,083 students (half boys, half girls) in grades 7-12, representing 26 school districts in 20 states.

Format. The WVI consists of 45 Likert-type items, to be rated on a 5-point scale from "Very Important" to "Unimportant." Each of 15 sub-scales has 3 items. These sub-scales include the following: creativity, management, achievement, prestige, independence, surroundings, supervisory relations, way of life, variety, economic return, security, associates, esthetics, altruism, and intellectual stimulation.

Administration. The WVI can be administered to groups or individuals, and can usually be completed in 10-15 minutes. The manual contains very specific administration instructions including the suggestion that the administrator establish an atmosphere of answering items frankly and sincerely.

Scoring. The WVI booklets are designed primarily for machine scoring, but they may also be scored by hand. A complete scoring key and instructions are contained in the manual.

Costs

MRC machine-scorable test booklets (includes 1 manual, 1 order for scoring service, 1 HMSS instruction sheet, and 9 ID sheets)	$21.00 (pkg. 100)
Manual	.90
Specimen Set	1.20
Scoring service (per student)	.45 (minimum charge $22.50)

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RELIABILITY

Stability. Some 99 10th grade students in a suburban Albany, New York, school were tested and retested after 2 weeks. Reliabilities ranged from .74 to .88 with a median r=.83.

Internal consistency. A variety of forms were tried out since 1951. The items were selected from a pool containing both old and new items. The selection criteria included good correlation of new items with original items--correlation ranged from .43 to greater than .80, with a median of .65; correlations greater than .70 occurred in one-third of the cases.

VALIDITY

Content validity. Empirical evidence for content validity is reflected in the manual in terms of results of a factor analysis and the relative independence of the subscales. In addition, items were phrased in accordance with a study of the literature on values; and items were revised in light of interviews, essays, and card sorts on the meaning of the terms and constructs.

Construct validity. The constructs of the WVI are based partly on Spranger's theory of values and the Allport-Vernon-Lindzey Study of Values, which is itself based on and has validated Spranger's theory, and partly on job satisfaction research as reported in the literature. The manual shows evidence of validity through correlations of WVI scales with the AVL Study of Values (as well as the Strong Vocational Interest Blank and the Kuder Preference Record).

Concurrent validity. The WVI scales have been correlated with other measures and criterion variables. On its relationship to personality measures, the manual states that ". . .work values, like more measurable variables, are not appreciably related to personality traits." Its relation to curricular differences for grades 7-12 are not great enough to be of practical value in counseling or selection, although they may prove significant for higher educational levels and various types of technical and business institutes. Its relationships to grade and sex are similary insignificant.

OTHER TECHNICAL INFORMATION GIVEN

The following information is also available: intercorrelations of scales; sex differences in work values, grades 7 and 12; and data, presented by sex, on 6 factors identified by researchers in 1961 (security-economic-material; social-artistic; work conditions and associates; heuristic-creative; achievement-prestige; and independence-variety).

SOURCE

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REFERENCE

Super, D. E. Work Values Inventory manual. Boston: Houghton Mifflin, 1970.